FORCE DYNAMICS AND CAUSATION IN AKAN

BY

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DECLARATION

I do hereby declare that this thesis is the result of my own original research and has not been presented either in whole or in part for another degree elsewhere. References to other sources of information used in this work have been duly acknowledged.

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DEDICATION

To my mentor, Prof. E. Kweku Osam

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ABSTRACT

This study investigates the expression of force-dynamics in Akan (Talmy 2000). Two main types of causatives can be found in the language, namely non-periphrastic causatives (lexical causatives and cause-effect SVCs) and periphrastic causatives (analytic causatives). The study examines the syntactic properties of causatives and shows that while lexical causatives and cause-effect SVCs involve a monoclausal structure, the analytic causative displays a complex (bi-clausal) structure. In Akan, the difference in the coding of the causee argument in analytic causatives is neither coincidental nor superficial but points to a difference in syntactic properties and structure. It is argued that the different syntactic marking of the causee argument in Akan causatives is not predicted by a syntactic case hierarchy as claimed by Comrie (1976) neither is it motivated by the degree of agentivity of the causee in the causative interaction as Cole (1983) proposed. Rather, the alternative marking of the causee is as a result of restructuring of a complement causative sentence into a partial lexicalised serial verb construction in the language.

Five event types of causation are identified namely, MANIPULATION, CREATE, TRIGGER, PROMPT and ALLOW and their properties analysed through Talmy's (2000) *force-dynamics* framework. The notion of direct and indirect causation is also examined in Akan. It is emphasized that, at least in Akan, it is better to map event type of causation with the notion of (in)directness of causation because a single causative expression may involve more than one event type of causation.

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ABBREVIATIONS

1	first person
2	second person
3	third person
ABS	absolutive
ACC	accusative
AGO	agonist
ANT	antagonist
ASP	aspect
AUX	auxiliary
CAUS	cause
CD	clausal determiner
COMP	complementizer
COMPL	completive
CONS	consecutive
DAT	dative
DEF	definite
DET	determiner
DO	direct object
EGR	egressive
ERG	ergative
FD	force-dynamics
FOC	focus

FUT	future
INA	inanimate
IND	indicative
INST	instrument
IO	indirect object
IRR	irrealis
NEG	negative
NOM	nominative
NP	noun phrase
OBJ	object
OPT	optative
OSV	object subject verb
PAST	past
PERF	perfect
PL	plural
POSS	possessive
Prep	preposition
PROG	progressive
PROS	prospective
RED	reduplicated
REFL	reflexive
REL	relativizer
RESUL	resultative
SG	singular

SOV	subject object verb
SUBJ	subject
SVC	serial verb construction
SVO	subject verb object
TOP	topic
V	verb

CHAPTER ONE

INTRODUCTION

1.0 INTRODUCTION

Causation is a fundamental concept in human thought and expression of reality. It underlies structuring of human conception of interaction between entities in the real world (Croft 1998). According to Lakoff and Johnson (1980:69), causation characterizes the organization of physical and cultural realities by individuals in speech interactions. In other words, causation constitutes a defined conceptual structure of reality which underlies expressions of perceived interaction between bodies.

Over the years, the linguistic expression of causation has attracted the attention of linguists working on various languages (for example, McCawley 1968; Shibatani 1973a and 1973b, and 1976; Comrie 1976, 1985b and 1989; Dixon 2000 and 2012; Shibatani and Pardeshi 2002).[1] Significantly, the causative is one of the most researched topics in linguistics.[2] However, the study of the syntactic structure and semantic properties of causatives has generated a considerable range of varied opinions as languages show increasing complexities and differences in expressing this notion. Indeed, many studies have shown that different languages display different (or rather additional) syntactic or semantic types and properties of the causative which were either undiscovered in previous work(s) or are simply under-investigated. Thus, part of the problem in accounting for the causative has to do

with the lack of relevant data and discussion from a wide variety of languages which display various causative constructions and semantic properties. This thesis, therefore, aims to supply fresh data on causative constructions from Akan and to show the various syntactic and semantic properties of the causative which has not yet been discussed in the literature.

The causative in Akan has been commented on sparsely over the years. The syntax and semantics of causatives in Akan has been examined, albeit in less detail, by Essilfie (1984), Saah (1989), Osam (1994a, 2004), Lord et al. (2002) and Boadi (2005a). What is significant about all these works, however, is that none of them treats the causative as the sole topic of their work. Rather, each of these works though intimating important syntactic and/or semantic properties of the causative discusses the range of causative constructions in the context of a conspectus of another phenomenon, usually serialization or complementation. Agyekum (2004) however, is a notable exception; it treats causativity as a topic on its own. Agyekum (2004) provides some morphosyntactic types of the causative and discusses some semantic types of causatison in Akan. However, Agyekum's (2004) study of Akan causatives is presented in a rather short paper and does not discuss in detail some key syntactic and semantic issues such as the clause structure and properties of various causative expressions and the different event types of causation expressed in Akan causatives. Thus, significantly, a detailed account of causative constructions is conspicuously missing from the Akan linguistics literature.

The aim of this study, therefore, is to bridge the gap in the study of Akan by providing a detailed account of causative constructions in the language. The study supplies novel data to the cross-linguistic study of the causative and interrogates some of the characterization and conception of the causative found in the literature. The causative provides one of the best platforms on which the grammar of a language can be studied as it encompasses all aspects of grammar such as phonology, morphology, syntax, semantics and pragmatics (Comrie 1989:165). Consequently, linguistic research on any language must necessarily include a study of causative constructions to be complete.

2.0 AIMS/OBJECTIVES

This thesis has three main goals:

(1). To explore the morphosyntactic means used to express causation in Akan

(2). To examine the syntax of causatives in Akan by identifying tests which could be used to determine the syntactic properties of different causative expressions in the language

(3). To present a semantic analysis of the major event types of causation expressed in causatives in Akan using Talmy's *force-dynamics* framework.

3.0 DATA

Some of the data for this study are sentences extracted from various written works such as books and novels written in the Akan language. Sentences used in written works are more likely to be accepted by a wide range of speakers as they tend to reflect a more acceptable way of speaking. This type of data will be necessary for establishing major event types of causation as we may be able to find contextual information on the constructions used. Where data elicited from native speakers of the language are used these are indicated accordingly. In many instances, however, the sentences used are from my native speaker knowledge.

4.0 THE AKAN LANGUAGE

4.1 Dialects

Akan is a Kwa language of the Niger-Congo language family. The name Akan refers to a group of dialects spoken in the Ashanti, Eastern, Brong Ahafo, Central and Western regions of Ghana. Pockets of Akan speaking communities can also be located in Cote D'Ivoire (Dolphyne and Dakubu 1988; Agyekum 2012). Akan has quite a number of dialects namely, Asante, Fante, Akuapem, Bono or Bron (also Abron, spoken in Cote D'Ivoire), Wasa, Agona, Akyem, Kwahu, Denkyira, Assin, Akwamu (Dolphyne and Dakubu 1988; Lewis 2009). Also, some of the dialects have identifiable sub-dialects. For instance, Fante can be divided into sub-dialects like Anomabo Fante, Abura Fante, Agona and Gomua (Dolphyne and Dakubu 1988:52). Again, according to Bota (2002), Bono has about six identifiable sub-dialects which are spoken in six different towns namely, Jaman, Berekum/Sunyani/Dormaa, Wenchi/Techiman, Nkoranza/Kintampo and Atebubu.

However, it is believed that the sub-dialect spoken in Wenchi/Techiman area is the closest to the Bono dialect as speakers are thought to be original Bono settlers (Bota 2002).

Statistics from the 2000 Housing and Population Census conducted in Ghana indicates that of all the main dialects of Akan, Asante is the most widely spoken with over 2.5 million speakers, followed by Fante with over 1.7 million speakers and Bono with just under 800,000 speakers (Ghana Statistical Service 2002).[3] Usually, many speakers associate themselves with the names of the dialects even though the dialects are mutually intelligible and the material culture of the people is quite similar. It is also the case that mutual intelligibility between the dialects reduces as geographical distance increases between dialect speaking areas. In the 1950's, however, the name Akan was adopted to refer to all the dialects of the language (Dolphyne 1975). However, Dolphyne and Dakubu (1988) note that "even today, many people will still say they speak the Fante or the Twi language rather than the Akan language." The name Twi is sometimes used to refer to the same group of languages although it has been asserted that Twi excludes the Fante varieties (Dolphye and Dakubu 1988; Osam 2004:2).

Among the dialects, Akuapem, Asante and Fante have different orthographies which are officially recognized and taught in schools. However, in the 1950's, a committee was charged to develop a unified orthography for the dialects (Akan orthography) so that publications in the language would not have to be written over again into the different dialects (Dolphyne and Dakubu 1988:57). In practice,

however, the unified orthography has not been rigorously enforced; hence, written works continue to use individual orthographies of the dialects. In this thesis, the Asante dialect is used as the default language; where examples are from different dialects these are indicated accordingly as (Fa.) for Fante, (Ak.) for Akuapem, (Kw.) for Kwahu, (Aky.) for Akyem and (Bo.) for Bono.

4.2 Sociolinguistic Aspects

Akan is the most prominent indigenous language spoken in Ghana in terms of number of speakers; it is the most widely spoken language across the country. In fact, according to the 2000 Housing and Population Census, it is estimated that over seven million people speak the language. A good number of people in the country also use Akan as a second language. However, as Osam (2004:2) indicates, because of lack of substantive research in this development, it is hard to conclude on the number of people who actually use Akan as a second language.

In Ghana, the main lingua franca is often considered to be English which also has the status of official language. It seems, however, that the English language does not enjoy this prestige alone but enters into an overlapping function with Akan as lingua franca in what may be described as a 'double overlapping diglossic' language situation (Guerini 2006; see also Fasold 1984). English is limited in terms of its function as a lingua franca because only educated people resort to its use when there is no common mother tongue among interlocutors. On the other hand, Akan may be used by both the literate and non-literate folk in the absence of a common first language.

Akan is increasingly used in various domains of communication across the country. In education, the indigenous languages are sanctioned as the medium of instruction in the lower primary (class 1–3) where possible, after which years it is taught as a subject in the schools. Akan and other indigenous languages are also studied as a subject at almost all levels of education in the country.

Akan has also gained prestige, over the years, as the language of the media. With the sprouting of many radio stations, Akan is used to hold many programmes like political talk shows, newspaper review programmes and perhaps more importantly, in broadcasting major news bulletins. Some radio stations broadcast news over 20 different radio frequencies and networks at a time aiding the spread of the language. Many people who call during phone-in sessions on many radio stations may use Akan regardless of their mother tongue. Thus, for many of the radio stations in the Greater Accra, Ashanti, Eastern, Brong Ahafo, Western and Central regions of Ghana, Akan is the dominant language used in broadcasting. Consequently, Akan has gained a status as the language of advertisement of goods and services on the radio and television networks across the country (see Anderson and Wiredu 2007; Vanderpuije 2010). Furthermore, some churches who hitherto had their church service in mainly English now have ‘Akan Service,’ in their quest to reach the non-literate populace. Still, other English-only churches employ interpreters to interpret sermons from English into Akan.

The movie and music industry also testify to the pervasiveness of the use of Akan in the country. Interestingly, the past decade has seen a tremendous surge in the production of movies which use only Akan as the language of communication. Such movies have gained much popularity in most parts of the country and have become acceptable to the Ghanaian populace. This is especially evident in the upsurge of Ghanaian sensational comedy movies which have become much popular with the introduction of Akan as the language of communication which has delighted local folks and others alike.

The story in the music industry is quite similar. Since the introduction of hip-life music (which is a combination of hip-hop and highlife or afro beats), Akan has been the main language used in this genre (although Pidgin English has featured quite prominently in some songs). The most popular and sensational hip-life songs are produced in Akan rap and twists. Some artistes have even gained a reputation for using some forms in Akan usually associated with the older folks and those proficient in the language. Thus, many hip-life artistes try to perfect their rapping and singing skills in Akan signifying recognition, on the part of the musicians, of the important function of the language in most Ghanaian societies.

Of course, in many Ghanaian communities, indigenous Ghanaian languages (apart from Akan) play various important roles. However, the coverage of Akan (in terms of its usage) seems to engulf quite a large geographical area and it is employed frequently in a wide range of communicative settings than any other Ghanaian language. Perhaps Osam (2004:3) is right when he concludes that “even though no

official declaration has been made, Akan is growing in its influence as a potential national language, especially since people who speak other languages sometimes use it as a lingua franca."

4.3 Linguistic Features

In this section, I will introduce some aspects of Akan phonology, morphology and syntax and the related research which has been carried out in these areas.

4.3.1 Phonology

Akan has eighteen (18) consonants and nine (9) oral vowels with a tenth vowel /æ/ which is a variant of /a/ (Dolphyne and Dakubu 1988). The vowels are grouped into two sets based on tongue root properties. Set I has {i, e, u, o, æ} which are vowels produced with advanced tongue root (+ATR) while Set II consists of {ɪ, ɛ, a, ɔ, ʊ} produced with unadvanced tongue root (-ATR). Five (5) of the nine vowels, {ĩ, ɪ̃, ã, ũ, ʊ̃,} can be nasalized. In verbal and nominal affixation, vowel(s) selected harmonize in ATR value with the vowel(s) in the verb or nominal stem to yield what has been referred to as cross-height harmony (Stewart 1967). In the Fante dialect, vowel prefixes harmonize also in (un)rounding feature with the vowel(s) in the verb or nominal stem.[4]

Akan, like many of the Kwa languages, is a tonal language. There are two identifiable tones in the language: low (`) and high (´) tones. The tones perform both lexical and grammatical functions in the language (Dolphyne 1988). This means that the meaning of a word does not depend only on the vowels and

consonants which make up the word but also on the tone marking of the form. Thus, the different meanings of the form *papa* (4a-c) depend on the tonal melody on the word. Also, (4a-c) shows that the tone bearing unit (TBU) is a vowel (but sometimes a syllabic nasal) (Dolphyne 1988). In this study, therefore, I will mark tones in the various examples.

(4)a. Kofi pàpá
Kofi father
Kofi's father.

b. Kofi pàpà
Kofi fan
Kofi's fan.

c. Kofi pápá
Kofi good
Kofi's goodness.

The phonology of Akan has been extensively studied. In this vein, Schacter and Fromkin's (1968) research remains a classic. At the time, their work provided the sole reference for the phonological system of the Akan language in a comparative study. Significantly, their work served as a springboard for subsequent investigation into the phonology of Akan. Following Schacter and Fromkin's (1968) generative phonological description of Akan, Cahill (1985) presented an analysis of the relationship between nasality and tonal structure in autosegmental phonology. His work provided diachronic information on the development of some verbal aspects in the language.

Dolphyne (1988) also provides a descriptive presentation of the phonology of Akan and her work has remained an important introductory book to the study of Akan phonology until now. Dolphyne (1988) presented the vowel and consonant inventory of the language and explained how vowel harmony is manifested. She also examined the underlying tonal structure of Akan word classes and how tonal contrasts in the language can be identified (downdrift, downstep and gliding pitches). Dolphyne's (1988) work is important because it is has become the most comprehensive comparative analysis of the phonology of Akan (with keen attention to the dialectal differences) after Schacter and Fromkin's (1968) earlier work.

Topics in Akan phonology which have been researched into include tone marking and tonal sandhi rules in phrasal categories (Abakah 2005a and 2005b, 2010; Marfo 2004), tone in focus and topic constructions (Boadi 1974; Marfo 2003, 2005; Genzel 2013) and vowel harmony (Boadi 1963; Stewart 1967; Clements 1981; O'keefe 2003). A collection of UCLA papers published in 1987 also presented research on the phonetic properties of Akan vowels and how these can be distinguished in some of the dialects of the language (see for example, Hess 1987 and Lindau 1987).

4.3.2 Syntax and Morphology

The predominant word order in clausal constituents in Akan is SVO, or in Dryer's (2007) terms, SV:VO. Greenberg's (1963) universal word order generalization predicts that if a language has SVO word order it would exhibit a Prep > NP

constituent order and that "SVO 'posts' are unusual" (Dryer 2007:79). Akan, however, can be identified as one of these 'unusual' SVO languages which have postpositions as opposed to prepositions. In this language, the coding of space, location or landmark of an entity in relation to another is expressed by morphemes which are, in fact, nouns (see Osam et al. 2011). These nouns are derived largely from two sources: body and object parts. The term postposition has been used to refer to these lexical items mainly because they follow the noun whose location or space they describe. Examples (5a) and (6a) show the use of body part *àkyĭ* 'back' and *ànĭḿ* 'face' as independent nouns which are heads of the NP respectively. However, in (5b) and (6b) *àkyĭ* and *ànĭm* occur as a possessed noun and function as locative/spatial morphemes.

(5)a. Àkyí nó á-móá
back DET PERF-dent
The back is dented.

b. Àbòfrá nó gyìnà èfíé nó ákyí
child DET stand house DET back
The child is standing behind the house.

(6)a. Ànímḿ nó á-yɛ́ fí
Face DET PERF-do dirty
The face/front is dirty.

b. Káà nó ánímḿ á-móá
Car DET face/front PERF-dent
The front (part) of the car is dented.

Thus, the so-called postpositions straddle between categories because they diverge functionally. Syntactically, such forms are nouns but they may also have the grammatical functions of coding location, space or landmark of one entity in

relation to another. Consequently, Osam et al. (2011:118) propose that they be referred to as *relator nouns* in the language.[5] Thus, the force of grammaticalization in employing existing forms for novel functions can be seen in the Akan language.

As far as grammatical relations are concerned, Akan employs a nominative/accusative system for nominals in sentences. This order is specified in the pronominal system of the language (see Table 1.1 below).

Table 1.1. *Akan pronominal system* (based on Osam 2004:4)

	Person	Nominative	Accusative
SG	1	*me*	*me*
	2	*wo*/*i*- (Fa.)	*wo*
	3	*ɔ*-	*no*/*ne* (POSS)
PL	1	*yɛ*-/*hɛn* (Fa.)	*yɛn*/*hɛn* (Fa.)
	2	*mo*-/*wɔ*- (Fa.)	*mo*/*hom* (Fa.)
	3	*wɔ*-/*yɛ*-/*ɔmo* (As.)	*wɔn*/*yɛn*/*hɔn* (Fa.)/*ɔmo*
Inanimate		*ɛ*-	Ø

(7)a. Mè mà-à wò bì
1SGSUBJ give-COMPL 2SGOBJ some
I gave you some (of it).

b. Wó mà-à mè bì
2SGSUBJ give-COMPL 1SGOBJ some
You gave me some (of it).

c. Ɔ̀-mà-à nò bì
3SGSUBJ-give-COMPL 3SGOBJ some
He/she gave him/her some (of it).

(8)a. Yɛ̀-bò-ò mò
1PLSUBJ-beat-COMPL 2PLOBJ
We beat you.

b. Mó-bò-ò yɛ̀ǹ
2PLSUBJ-beat-COMPL 1PLOBJ
You beat us.

c. Wɔ̀-/yɛ̀-bò-ò wɔ̀ǹ/yɛ̀ǹ
3PLSUBJ-beat-COMPL 3PLOBJ
They beat them.

As shown in (7a-b), in Asante, the first and second person singular subject and object pronouns have the same form and their subject or object status is determined by their relative positions in the clause. The third person singular subject and object pronouns, however, have different morphological forms and, therefore, their position in the clause is rather fixed (7c). With first and third person plural pronouns, there is a drop of the final consonant of the form in the subject pronoun such that the morpheme together with the verb (and its inflections) form a phonological word (8a, c). On the other hand, the second person plural subject and object are represented by the same form but distinguished based on their position in the sentence (8b).

In addition to pronominal marking, however, Akan has other ways of telling subjects from objects. Osam (1994a, 1996 and 2000) observed that the distinction between subject and object NPs in the language can be seen more clearly in behavioral or rule-governed properties of the NPs in a clause. For example, only the grammatical subject may “control zero pronominalization under coreference in

clause chaining" (Osam 1996:257). Thus, in the clause it is only the subject NP which may control the deletion of pronominal marking on non-initial verbs in a (serial verb) construction. Consider the following examples in (9a-b).

(9)a. Yaw frɛ́-ɛ́ Yaa Ø-sòmá-à nò
Yaw call-COMPL Yaa 3SGSUBJ-send-COMPL 3SGOBJ
Ø-kɔ̀-ɔ̀ Nkran
3SGSUBJ-go-COMPL Accra
Yaw called Yaa and sent her to Accra.

b. *Yaw frɛ́-ɛ́ Yaa Ø-sòmá-à Ø
Yaw call-COMPL Yaa 3SGSUBJ-send-COMPL 3SGOBJ
Ø-kɔ̀-ɔ̀ Nkran
3SGSUBJ-go-COMPL Accra
Yaw called Yaa and sent her to Accra.

Thus, in (9a), it is only the subject (Yaw) which may control the deletion of pronominal marking on the verb under coreference. An object, on the other hand, does not have a choice in this matter but has to be overtly marked in the sentence as deletion of the coreferent pronoun may result in an ungrammatical sentence (9b). As we shall note in chapter four, the different behavioral properties of subjects and objects is vital in understanding the syntax and nature of grammatical relations exhibited in the causative in Akan.

With regard to the morphological expression of time in Akan, Dolphyne (1987) identifies ten (10) tense/aspect verbal forms namely, Habitual, Stative/Continuative, Past, Perfect, Progressive, Immediate Future, Indefinite Future, Consecutive, Imperative I and Imperative II. For the most part, the

tense/aspect categories are coded on verbs through affixation. Examples of tense/aspect categories which are marked through affixation include the Perfect, Progressive, Consecutive Past and Future.

Some of the tense/aspect categories, however, take on different meanings in certain contexts in the language. Consider, for example, the future tense. In Akan, future time is marked by a prefix /bɛ-/ on the verb stem and this can also be used to express other irrealis meanings such as marking an event as prospective or potential. Thus, Boadi (2008:22-24) indicates that in certain contexts, "the future affix does not refer to future time at all." Consider the sentences in (10a-c) below.

(10)a. Kofi bé-kɔ́ fíé ɔ̀kyénά
Kofi FUT-go house tomorrow
Kofi will go home tomorrow.

b. Ɛ̀-bɛ́-hyɛ́ àkònwá nó ásé
3SGSUBJ-IRR-be.in chair DET under
It may be (concealed) under the chair.

c Ɛ̀-bɛ́-yɛ́ sɛ́ ɔ̀-bà-à há
3SGSUBJ-IRR-be that 3SGSUBJ-come-COMPL here
It is possible/likely that he/she came here.

In (10a), it can be observed that /bɛ-/ is used to mark future time which is confirmed by the presence of the adverb *ɔkyena* 'tomorrow'. However, in (10b), when /bɛ-/ occurs with a stative verb, it expresses prospective (or irrealis) meaning. Also, /bɛ-/ may be used as a modal expressing possibility. Thus, although /bɛ-/ is usually analyzed as a future tense marker, the form is not an

exclusive future tense morpheme rather it is primarily used to express prospective meanings which may involve future time reference.

Not all tense/aspect categories in the language, however, are marked through affixation. The habitual is marked by a high tone on the final vowel of the verb (Boadi 2008:17). Even though the language does not have a present tense morpheme per se, present time can be deduced from the habitual and other imperfective aspects. Consider the examples in (11a-b).

(11)a. Kwame gyìná há
Kwame stand.HAB here
Kwame stands here (everyday).

b. Ɔ̀-kàsá dòdò
3SGSUBJ-talk.HAB many
He talks too much (i.e. he is a talkative).

Examples (11a-b) can be said to convey a present time reading. This is because, as Comrie (1985a:39) notes, "sentences with habitual aspectual meaning refer not to a sequence of situations recurring at intervals, but rather to a habit, a characteristic situation which holds at all times." Thus, (11a-b) involve present time because the proposition of the utterance spreads over from the past through present to the future.

In Akan, past time marking can be realized in two main ways: (a) it is marked by lengthening the final vowel (or nasal) of the verb if the verb stem is followed by a direct object or an adverbial; (b) if the verb occurs at clause final (without an

object or adverbial) the suffix /-i/ or /-e/ (each selected to reflect vowel harmony) is used (compare (12a-b)). The Asante dialect employs the suffix /-eɛ/ or /-yɛ/ in the latter context (12c). However, in negation, past time is marked by a prefix /a-/ (12d). The negative is marked by a homorganic nasal prefix which takes its form by copying the place of articulation of the initial consonant of the verb stem.

(12)a. Ama bà-à fíé
Ama come-COMPL home
Ama came home.

b. Ama bà-è
Ama come-COMPL
Ama came.

c. Ama bà-eɛ
Ama come-COMPL
Ama came.

d. Ama á-n-tú dùá nó
Ama COMPL-NEG-uproot tree DET
Ama did not uproot the tree.

Following Osam (1994a, 2004), morphemes expressing past time have been glossed as Completive aspect (COMPL) in this thesis. Osam (2004) has shown that Akan is better analyzed as an aspectual-modal language which makes a two-way distinction between future and non-future time. He argues that the morphemes which code past time are better identified as completive aspect rather than past tense markers because the primary function of such morphemes is to mark perfective or completive events and that past time is only a secondary meaning. Thus, the so-called past tense morpheme, in effect, expresses events as a

completed whole. According to Osam (2004:8), this explains why the morpheme is not compatible with imperfective aspects, such as the Progressive (see ch. 4, section 3.1 for discussion on marking of Progressive). Consider the following sentences in (13a-c).

(13)a. Ama bò-ò àbɔ́frá nó
Ama beat.COMPL child DET
Ama beat the child.

b. Ama-à bó àbɔ́frá nó
Ama-PROG beat child DET
Ama is beating the child.

c. *Ama-à bò-ò àbɔ́frá nó
Ama-PROG beat-COMPL child DET
Ama was beating the child.

d. Mè-kɔ̀-ɔ̀ɛ̀ nó ná Ama-à bó àbɔ́frá nó
1SGSUBJ-go-COMPL DET CONJ Ama-PROG beat child DET
When I went Aman was beating the child.

Thus, the unacceptability of (13c) is due to the fact that an event cannot be expressed as completed and ongoing at the same time. Note, however, that the English translation of (13c) is grammatical because *be* is inflected for Past tense. The primary function of the so-called past tense, therefore, is to express an event as completed and past time reference is a product of completive events. In expressing past imperfective events, however, Akan employs a discourse particle (or conjunction) *ná* which anchors an initial event in the past so that the noninitial event can be inflected with the progressive.[6]

Akan is widely known for the use of multi-verb constructions or verb serialization. Since Christaller (1875) identified serialization as a prominent linguistic feature of Akan over a century ago, subsequent works have shed light on the semantic and syntactic properties of serialization, albeit with different outcomes (Stewart 1963b; Ansre 1966; Lord 1973, 1993; Essilfie 1977 and 1984; Dolphyne 1987; Osam 1994a and 1994b, 1996, 1997 and 2004; van der Veen 1998; Agyemang 2002; Hellan et al. 2003). Osam (1994a) classified Akan verb serialization into two types: Clause Chaining (CC) and Integrated Serial Verb Construction (ISVC). The CC type (14a) consists of verb series which chains separate events in a sequential order. On the other hand, in ISVC the verb series code a tightly integrated or unitary event. Thus, even though in (14b) there are two verbs *gye* 'take' and *di* 'eat' these are not two separate events but are used metaphorically to express the unitary event of believing someone. As shown in (14a-b), in both CC and ISVC, however, there is uniformity in the marking of tense/aspect and mood categories (for the relevant discussion, see Osam 1994a, 2004; Dolphyne 1987).

Clause Chaining (CC)

(14)a. Ama sɔ́ré-è ànɔ́pá sì-ì ǹnéɛ́má
Ama stand-COMPL morning wash-COMPL things
Ama got up this morning and washed (her) clothes.

Integrated Serial Verb Construction (ISVC)

b. Akosua gyè-è Akwasi dɨ̀-èɛ̀
Akosua take-COMPL Akwasi eat-COMPL
Akosua believed (in) Akwasi.

Clause chaining (CC) and Integrated SVC (ISVC) display different semantic properties. In CCs the verb series express clearly identifiable sub-events which can be separated by a conjunction (15a). However, as was observed in (14b), ISVCs involve a series of verbs which are highly lexicalized and, therefore, function together as a single predicate. Consequently, in ISVC, the verb series cannot be separated by a conjunction hence, the ungrammaticality of (15b).

(15)a. Ama sɔ̀ré-è ànɔ̀pá nà ò-sì-ì ǹnéɛ́má
Ama stand-COMPL morning and 3SGSUBJ wash-COMPL things
Ama got up this morning and she washed (her) clothes.

b. *Akosua gyè-è Akwasi nà ò-đì-ì
Akosua take-COMPL Akwasi and 3SGSUBJ-eat-COMPL
Akosua believed Akwasi.

Van der Veen (1998:48) notes another important syntactic difference between the two SVCs found in the language:

> In Akan, the semantic property of SVC proper [ISVC] … corresponds to a syntactic restriction, namely that no adverb can intervene between the shared object NP1 and V2 [but] in SVCs other than SVC proper [CC], the adverb can in fact appear between NP_1 and V_2."

Consider (16a-b).

(16)a. Bamfo frɛ̀-è Frema (ɛ́nórà) sòmá-à nò
Bamfo call-COMPL Frema yesterday send-COMPL 3SGOBJ
Bamfo called Frema (yesterday) and sent her.

b. Akua bɔ̀-ɔ̀ m̀páéé (*ɛ́nórà) mà-à Akwasi
Akua break-COMPL prayer yesterday give-COMPL Akwasi
Akua prayed (yesterday) for Akwasi.

We observe from (16a) that an adverb may be inserted between NP_1 and V_2 in clause chaining SVC (where the adverb has necessary scope over V_1) but this is not possible in an ISVC (16b) because of high integration of the events described by the verb series. This analysis is significant in that it shows the structural position(s) and functions of adverbs in the clause. Significantly, (15) and (16) intimate a strong relationship between the occurrence or non-occurrence of a conjunction or an adverb in a sentence and the level of semantic or syntactic integration exhibited in a sentence. Thus, where two related constructions seem to display similar syntactic structures a plausible technique would be to determine the distribution of functional items in the clause and the relative syntactic consequence(s) for the sentence. As I will demonstrate in chapter four, the two types of analytic causatives found in Akan are better analyzed by applying similar tests to each of the constructions to reveal their syntactic properties.

Significantly, research on serialization in Akan has emphasized grammaticalization– the development of functional items from lexical morphemes– as a potent force in the synchronic state of the language. A number of studies have identified some lexical items which have lost some or all their lexical properties and have taken on grammatical functions in serial verb constructions. For instance, Ansre (1966) observed the development of the verb *wɔ́* 'be at' in

SVCs and concluded that this morpheme is better analyzed, not as a verb, but rather as 'verbid' because in SVCs it does not inflect for tense/aspect categories of any kind.[7] Notice the different functions of *wɔ́* in the sentences below in (17a-b).

(17)a. Kwame wɔ̀ Nkran
Kwame be.at Accra
Kwame is in Accra.

b. Kwame kɔ̀-ɔ̀ sùkúù wɔ̀ Nkran
Kwame go-COMPL school in Accra
Kwame went to school in Accra.

Examples (17a-b) show that the locative morpheme is never inflected for tense/aspect in the sentence. Accordingly, Ansre (1966) argues that a sentence like (17b) is no longer an SVC since in reality it does not contain two verbs but one. Ansre's (1966) observation of the status of *wɔ́* as a 'verbid' has been supported by Lord (1973) who also states that the form should be considered as a preposition.[8] While there is a consensus that *wɔ́* has lost its verbal properties in SVCs, Osam (1994b) argues that evidence in the language show, however, that the conclusion that *wɔ́* is not a verb seems somewhat premature. This is because as shown in (17a-b), there are clearly two different functions of *wɔ́* in these sentences. In (17a), the morpheme occurs as the lexical verb of the sentence but in (17b) as a locative morpheme. Thus, the behavior of *wɔ́* demonstrates Hopper's (1991) principle of *divergence* where a lexical item may diverge functionally retaining its lexical uses but also taking on some grammatical functions as well.

Indeed the force of grammaticalization has been shown to be at work in the development of new meanings and functions of existing lexical items in the Akan language.[9] Grammaticalization has, therefore, become a crucial theory in understanding, not only the function of certain words, but also the development of some constructions in language. For instance, some dialects of Akan are developing alternative constructions via grammaticalization. A case in point is the grammaticalization of the GIVE construction into a causative construction in Akan. In chapter three, we examine the development of the verb *má* 'give' into a benefactive marker, causative marker, a resultative marker and a complementizer.

The foregone review of the literature on Akan phonology and syntax reveals that a great deal of work has been done on the language as far as some linguistic topics are concerned. Indeed, there have been a number of doctoral theses on aspects of the syntax of Akan for over four decades (for example, Stewart 1963a; Boadi 1966; Essilfie 1977; Saah 1994; Osam 1994a; Ofori 2006). Linguistic research on Akan, however, is far from exhaustive. It has been iterated in this chapter that even though research on causative constructions has been active for over half a century in the general linguistic research arena, an extensive study of the phenomenon in Akan is yet to be underetaken. Thus, this study would add to what we know about the syntax and semantics of Akan by presenting a detailed account of causative constructions.

5.0 SIGNIFICANCE OF THE STUDY

This study reopens the discussion on multiverbal constructions and/or serialization by emphasizing a prototypical approach to the study of clause types in Akan. The study demonstrates that rather than insisting on necessary and sufficient conditions in identifying a clause as an instance of serialization or otherwise it would be more beneficial to consider the prototypicality of each type of construction based on what is typically assumed for a category and show where it converges or diverges with those assumptions. In this way, we would avoid the proverbial 'throwing the baby away with the bath water.' Also, this research supplies fresh data to cross-linguistic studies of the causative and identifies the status of Akan in language typology studies of causative constructions.

6.0 STRUCTURE OF THE THESIS

This study is organized into six chapters. Chapter one has presented the introductory issues about the topic, information on the language under investigation, objectives of the study and significance of the research. In chapter two, I will review the relevant literature on the linguistic expression of causation as far as its morphology, syntax and semantics are concerned. Also in this chapter, I present an introduction to Talmy's (2000) Force-Dynamics framework which I employ in analyzing the semantics of causation in Akan. Chapter three presents an overview of formal types of causative expressions and their morphosyntactic properties. In chapter four, I will examine the syntax of causatives with emphasis on the clausal properties and structure of each causative expression. Chapter five presents a Force-Dynamics analysis of the semantics of causative expressions in

Akan. The summary and conclusions of the study and recommendations for future research are presented in chapter six.

ENDNOTES

[1] The study of causation in Philosophy, however, predates the linguistic study of this notion and can be dated back to David Hume's (1711-1779) pioneering work *Treatise of Human Nature*. See Wolff (2008) for a review of the different accounts of causation in Philosophy and Psychology.

[2] In this thesis, we will invariably use the term 'causation' to refer to the conceptual notion of interaction between bodies but 'causative' or 'causativity' to represent the linguistic expression of this notion in language.

[3] Unfortunately, however, the 2010 Housing and Population Census report does not include statistics on speakers of the different Ghanaian languages.

[4] Boadi (2009) provides a comprehensive comparative study of the phonology of verbal affixes in seven Volta Comoe languages.

[5] Osam et al. (2011) suggest, however, that the relator noun *mu* 'inside' is advanced on the cline of grammaticalization in becoming a spatial or locative suffix since it may cliticize (as *-m*) on a preceding verb or noun in a phrase.

[6] The issue of whether Akan has a past tense has not been resolved, at least, not among linguists working on the language. For example, Boadi (2012) asserts that any system needs at least two members (or points of reference) for it to work. Thus, by postulating that there is future tense in the language, there must also be another tense namely, the past. Boadi, however, does not provide any empirical evidence for this assertion; neither does his analysis provide an explanation for the incompatibility of the past and imperfective aspect in the language.

[7] Actually, Christaller (1875:76) was the first to have recorded that the verbs *wɔ́*, *sɛ́* and *gyé* "have so far stripped off their verbal character and have become mere particles, as they do not assume any prefixes … nor the negative prefix."

[8] Lord (1973) categorizes *wɔ́* as a preposition because Ansre (1966) does not assign any syntactic class to the 'verbid'. Also, even though Boadi (1968:83, footnote 2) agrees with Ansre (1966) that *wɔ́* is not a verb, he rejects the idea of classifying it as a 'verbid' because of the lack of evidence or research to support 'verbid' as a syntactic category.

[9] For example, Amfo (2007, 2010) traces the development of the noun phrase conjunction *n(y)e* from a copula verb in the language. Osam (1994b) also provides a survey of verbal forms which are at different stages of grammaticalization in Akan. A discussion on the grammaticalization of body-part nouns into relator nouns has been reopened by Osam et al. (2011).

CHAPTER TWO

LITERATURE REVIEW AND THEORETICAL FRAMEWORK

1.0 INTRODUCTION

Causation has been shown to be basic to human conceptual organisation and structuring (Lakoff and Johnson 1980; Talmy 2000[1]). According to Croft (1998:68) "the world appears to be made up of an extremely complex causal network unfolding through time" and it is from this "complex causal network" that units of events are organized and expressed in language. The causative thus provides the underlying schema or fundamental conceptual structure from which events are perceived, organised, understood and subsequently expressed in language. Consequently, the notion of causation can be expressed in all languages.

Linguistically, the causative involves striking interfaces between different aspects of language. Thus, Comrie (1989:165) observes:

> Internally to linguistics, causative constructions are important because their study, even within a single language, but perhaps more clearly cross-linguistically, involves the interaction of various components of the over-all linguistic description, including semantics, syntax and morphology.

Therefore, understanding the structure of causative constructions is recognised as key to understanding language structure as a whole. The discussion which follows provides a review of some of the relevant theories put forward in the study of

causative constructions across languages. Included in this review is a conspectus of some of the challenging issues raised concerning various characterizations of causative constructions with regard to their morpho-syntactic and semantic types evident in different languages and the implications of such analysis in accounting for the causative in Akan. I will conclude this chapter with an introduction to the theoretical framework employed in this study namely, Talmy's *force dynamics*.

2.0 DEFINING CAUSATION IN LANGUAGE

All languages have a means of expressing some form of causative relation between two bodies or objects. However, providing a comprehensive, cross-linguistic definition of the causative has been anything but straightforward. This is due, in part, to the fact that across languages, we often find more than one means available to speakers in expressing causation. Again, since the range of causative expressions available in a language is an ultimate reflection of the different causal relations identified and distinguished by speakers "ready-made labels" which suggest a priori, strict, cross-linguistic valid generalizations of the causative often fall short of providing crucial insight into the linguistic structure of such expressions in language (see Wierzbicka 1998:116-117). As such, definitions of the causative have sufficed in relation to specific languages but have often proved inadequate when accounting for the same phenomenon in other languages.

Shibatani (1976:1-2), however, put forward two conditions which characterise the causative situation:

(i). The relation between the two events is such that the speaker believes that the occurrence of one event, the "caused event," has been realized at t_2, which is after t_1, the time of the "causing event."

(ii). The relation between the causing and the caused event is such that the speaker believes that the occurrence of the caused event is wholly dependent on the occurrence of the causing event; the dependency of the two events here must be to the extent that it allows the speaker to entertain a counterfactual inference that the caused event would not have taken place at that particular time if the causing event had not taken place, provided that all else had remained the same.

Shibatani's (1976) characterization provides valuable insight into the conception of the causative situation. Significantly, what constitutes a causative situation is essentially a *perceptual construct*. Thus, Kemmer and Verhagen (1994) also observe that

> In talking about causative, we are not referring to some notion of causation in the physical world, but rather to the *human conceptualization of causation*, which must be based in some fundamental mode or modes of thinking and organizing perceived reality that allows humans to interact successfully with their physical and social environment (Kemmer and Verhagen 1994: 117, italics mine).

In other words, the expression of causation is largely dependent on a speaker's world view. In turn, a speaker's world view is shaped by his immediate (physical) surroundings. As Evans and Green (2006) note:

> The concepts we have access to and the nature of the 'reality' we think and talk about are a function of our embodiment: we can only talk about what we can perceive and conceive, and the things that we can perceive and conceive derive from embodied experience... it is experience, meaningful to us by virtue of our embodiment, that forms the basis of many of our most fundamental concepts (Evans and Green 2006:46).

Accordingly, the idea of causation is grounded in the cognitive experience of speakers and, therefore, its perception and ultimately, its grammatical representation, may vary from speaker to speaker and from language to language. For example, according to Wolff et al. (2010), entities which may act as possible causers in a causative construction differ considerably from language to language. Their research shows that while in some languages objects like 'knife' and 'fork' are possible causers, in other languages such objects cannot be expressed as causers. Nevertheless, it can be noted that since embodied experience may be identical across cultures we can expect to find in different languages similar syntactic and semantic organisation of the range of causative meanings and expressions.

Causation also involves temporal sequencing between two (or more) events. The causative situation basically involves two events, causing and caused events, which have different temporal profiles; the causing event has temporal precedence over the caused event. Since the causing event is construed as occurring at a time t_1 prior to the caused event time t_2, in grammatical representation, this iconic order is usually expected and often realised (Song 1996 and 2008; Haiman 1985; Gilguin 2010).[2] However, defining the causative this way does not take into account the various word order parameters found across languages. For example, while the supposed iconic ordering of causing and caused events may be displayed in languages with SVO word order (1a), this relationship may not obtain in SOV (1b) or OSV (1c) languages.

Akan

(1)a. Kofi mà-à tòá nó bɔ̀-èɛ̀
Kofi make-COMPL bottle DET break-COMPL
Kofi made the bottle break.

Basque

b. Haiek Letona-ri liburu-a galdu erazi zioten
they-ERG Letona-DAT book-ABS lose make AUX
They made Letona lose the book
(Kemmer and Verhagen 1994:123).

Jacaltec

c. Ch-ach w-a' xewoj
ASP-2ABS 1ERG-give to rest
I make you rest (Craig 1977:362, in Newman 1996:175).

The causative situation also involves a logical sequence between two events such that the caused event is presented as *totally dependent* on the causing event; thus, if the causing event has not occurred then the caused event would also not occur. Many counterfactual models of causation emphasise that causation involves de facto dependence of caused event on causing event and these are usually stated in the form of necessary conditions and counterfactual probabilities (Wolff 2007). However, as Wolff (2007:84) observes, the use of necessary conditions criteria in dependency models of causation may distort the representation of speakers' perception of causation because of the tendency of over-generating causers which may lead to the wrong conclusion about the causative relation. Thus, for example, even though 'thunder' is associated with power outages, it does not *cause* power outages (Wolff 2007:83). Consequently, *which* can cause *what* in language may

not be organised in terms of counterfactual dependencies or probabilities even though such correlations may be implied by the meaning of causative expressions.

As has been iterated above, defining the causative presents a formidable challenge as the range of causative constructions across languages is by no means uniform. This is due, in a large extent, to the fact that causation as a linguistic notion is solidly based on speakers' cognition and view of reality. The varieties of causative constructions found in language, therefore, correspond to the diverse ways in which different speakers perceive reality vis-à-vis the morphosyntactic properties of a language. This problem is further compounded by pragmatic conditions and other non-linguistic factors which affects language use. Thus, paradoxically, the difficulty in accounting for the causative crosslinguistically is rather expected.

3.0 TYPOLOGY OF CAUSATIVE CONSTRUCTIONS

3.1 Morphosyntactic Types of Causatives

Traditionally, the causative has been classified into three main types: morphological, lexical and analytic causatives (Comrie 1989; Dixon 2000). This classification is based on the various morphosyntactic means of expressing causation in language.

3.1.1 Morphological Causatives

Morphological causatives involve the use of affixes to express causation. Morphological causatives can be found in languages with highly agglutinative morphology, such as Turkish, Quecha, Korean, Marathi, Yaqui, Hindi, Songhai,

Chichewa and Xhosa (Comrie 1989 and 1985b; Shibatani 1973; Shibatani and Pardeshi 2002; Guerrero 2007; Kachru 1976; Saksena 1982; Alsina 1992). Comrie (1989:160) notes regarding (prototypical) morphological causatives that "first, the causative is related to the non-causative predicate by morphological means, for instance by affixation… second, one can take any predicate and form a causative from it." Morphological causatives may involve reduplication of the verb stem, vowel lengthening, change in tone, the use of prefixes, suffixes and circumfixes and consonant mutation (Dixon 2000:33-34). For example, in Xhosa (a Bantu language spoken in South Africa), a causative morpheme *–isa* may be attached to a non-causative verb stem to produce causative meaning, as shown in (2) below.

(2). Morphological causative in Xhosa[3]

Verb stem		Causative	
ukufunda	'to study'	*ukufund**isa***	'to teach'
ukutya	'to eat'	*ukuty**isa***	'to feed'
ukulala	'to sleep'	*ukulal**isa***	'to cause to sleep'
ukuphakama	'to rise'	*ukuphakam**isa***	'to lift'

Also, in Yaqui (Uto-Aztecan, spoken in Mexico), the morphological causative suffix *–tua* is "most productive" and "combines with any kind of base form including nouns and statives" in causativization (3a-b) (Guerrero 2007:7).

Yaqui (Guerrero 2007:7-8).

	Base Form	Causative
(3)a.	*maatu* ‘charcoal’	*maatu-tua* ‘to blacken’
	chichi ‘saliva’	*chichi-tua* ‘to salivate/savor’
b.	*alle’a* ‘be happy’	*alle’a-tua* ‘to comfort’
	elpea ‘be healthy’	*elpe-tua* ‘to relieve’

Morphological causatives, however, differ in terms of their productivity and regularity. In some languages, the allomorphic variants of the causative form are regular and may be conditioned by specific phonological processes. For example, Turkish has two morphological causative variants, *-dir* and *-t* whose occurrence are phonologically conditioned; the former occurs after consonants (4a) while the latter occurs after polysyllabic stems (4b) (Shibatani and Pardeshi 2002:108).

Turkish

(4)a. Ali Hasan-~~ı~~ öl-***dür***-dü
Ali Hasan-DO die-CAUS-PAST
Ali caused Hasan to die, killed Hasan (Comrie 1976:263).

b. Dişçi mektub-u müdür-e imzala-***t***-t~~ı~~
dentist letter-DO director-IO sign-CAUS-PAST
The dentist made the director sign the letter (Comrie 1976:263).

However, in the same language, Turkish, there are irregular morphological causatives. For example, even though the regular process of deriving the causative of the verb *ak-* ‘flow’ and *pis-* ‘cook’ is expected to be **ak-tir* ‘make flow’ and **pis-tir* ‘make cook,’ respectively, they are realised as morphologically

unanalyzable words *akit* ‘make flow’ and *pisir* ‘make cook’ (Shibatani and Pardeshi 2002:108). In effect, these forms must be learned independently as different lexical words in the language.[4] Thus, even though morphological causatives form a distinguishable type of causative expressions, languages converge around its prototypical type (like in Yaqui) with varying degrees of productivity. Comrie (1989:160), however, indicates that “there is probably no language that illustrates the pure prototypical morphological causative, with unrestricted iterativity of the relevant morphological process.”

Even though Akan has less agglutinative morphology, Boadi (2005) argues that the language displays morphological causativization through reduplication of the verb stem. Thus, in (5a), *dá* ‘to sleep’ may be causativized through leftward reduplication of the stem to become *dè-dà* ‘to put to sleep’ (5b).

(5)a. Kofi dà-àɛ̀
Kofi sleep-COMPL
Kofi slept.

b. Kofi **dè**-dá-à àbɔ́frá nó
Kofi **CAUS**-sleep-COMPL child DET
Kofi put the child to sleep.

It can be noted, however, that the use of reduplication to derive morphological causatives is very limited in Akan and the process may be applied to a rather limited number of verbs. In chapter three, we will explore the details of

reduplicated causative verbs in Akan and show that such forms may be better analysed as a type of lexical causatives.

3.1.2 Lexical Causatives

Causation may be expressed by lexical verbs in language. It has been said that "most, if not all, languages have some lexical causatives" (Payne 1997:259). In lexical causatives "the relation between the expression of effect and the expression of causative macro-situation is so unsystematic as to be handled lexically, rather than any productive process" (Comrie 1989:161). Thus, in a lexical causative the notion of cause and effect is conflated into a single predicate. In other words, lexical causative verbs have causation as part of their underlying semantics.

Lexical causatives, however, may display causative/non-causative alternation of lexical verbs (Haspelmath 1993). Causative/non-causative alternation (or causative/inchoative alternation, à la Haspelmath 1993) refers to "a pair of verbs which express the same basic situation and differ only in that the causative verb meaning includes an agent participant who causes the situation" (Haspelmath 1993:90). Haspelmath (1993:89) shows two formal directions of causative/inchoative derivation which can be attested in language: (a) derivation of causative from inchoative, and (b) derivation of inchoative from causative. For example, in Mongolian, the causative *xajl-uul-ax* 'melt' (tr.) is derived from the inchoative *xajl-al* 'melt' (intr.) but in Russian, the inchoative *rasplavit'-sja* 'melt' (intr.) is derived from the causative *rasplavit'* 'melt' (tr.) (Haspelmath 1993:89). However, in a situation where the same form is used in causative/inchoative

alternation it may be difficult to tell the direction of the causative/inchoative derivation. For example, in Akan, the same morphological form of the verb *bɔ* 'break' is used in causative/non-causative alternation (6a-b). Verbs which have the same morphological form in causative and non-causative uses have been referred to as labiles (Kulikov 2001).

(6)a. Tòá nó bɔ̀-èɛ̀ (non-causative)
bottle DET break-COMPL
The bottle broke.

b. Ama bɔ̀-ɔ̀ tòá nó (causative)
Ama break-COMPL bottle DET
Ama broke the bottle.

The causative/non-causative alternation of lexical items may involve verb pairs which display idiosyncratic morphological differences between the non-causative and causative forms. Such verb pairs are called suppletives and constitute the ideal or prototypical lexical causative (Comrie 1989). With suppletives, there are two verbs which are morphologically unrelated to each other but express the same basic situation, as in (7a-b). However, while one of the verb pair expresses the event as autonomous or non-causative (7a), the other conveys it as a causative situation (7b).

(7)a. Àpɔ̀nkyé nó ***wù***-ì (non-causative)
goat DET die-COMPL
The goat died.

b. Kwame ***kùmì***-m̀ àpɔ̀ǹkyé nó (causative)
Kwame kill-COMPL goat DET
Kwame killed the goat.

Dixon (2000) provides a number of factors which could give rise to suppletive pairs in a language. He notes that in some cases, semantic factors in translation between languages may cause suppletion. For example, according to Dixon (2000:39), the verb *burn* when translated into Yimas would have two different forms: *awa* 'burn' (intr.) and *ampu-* 'burn' (tr.). Dixon (2000) further indicates that speech styles employed in a language may lead to suppletive forms. He cites Dyirbal, which has two dialects, Guwal and Dyalngual, according to speech style. While Dyalngul employs an intransitive affix *-irri-*, Guwal does not have any regular morphological process of realizing the intransitive form of the verb (8). Thus, Dixon (2000:40) observes that "the fact that Dyalnguy uses a single verbal form for each pair of verbs in Guwal indicates that they do have the same meaning, and differ just in transitivity."

(8). Dyirbal (Dixon 2000:40, in Dixon 1972:297).

Guwal	Dyalnguy	Gloss
bundi- (tr.)	*yilwu-* (tr.)	'take out'
mayi- (intr.)	*yilwu-irri* (intr.)	'come out'
bana- (tr.)	*yuwa-* (tr.)	'break'
gaynyja- (intr.)	*yuwa-irri* (intr.)	'break'

Dixon's observation on Dyirbal suppletive verbs forms echoes the problems encountered in identifying the underlying or basic verb in causative/non-causative alternating verbs. While in the case of Dyalnguy one would be quick to say the derivational morphology smacks of a 'derived form' such attestation is missing in Guwal, as it is in many languages. Furthermore, transitivity cannot be explained away only as a morphosyntactic phenomenon but has close affinity with semantic and discourse principles (see Hopper and Thompson 1980; Levin and Rappaport 1995). The irregularities in the realisation of suppletive pairs in language may well point to different but systematic ways of constructing verb meanings on the one hand, and assigning morphosyntactic properties to such forms on the other. In chapter three, I argue that suppletives pairs may be accidental pairs and may not be created as complement verb pairs as such.

3.1.3 Analytic (Periphrastic) Causatives

In this type of causative, there are two verbs: one carrying the idea of cause and the other conveying the notion of effect. Analytic causatives increase the valency of the clause by adding an extra argument, a causer argument. Analytic causatives have been called syntactic causatives because they usually occur as biclausal structures (Comrie 1976; Song 1996 and 2008; Dixon 2000). Thus, in this type of causative the causative verb occurs as the matrix verb while the verb of effect occurs in the embedded clause. For instance, in (9), the causative verb *make* functions as the matrix verb and takes an embedded clause as its complement; however, the verb which expresses effect *type* occurs as the embedded predicate.

Thus, in analytic causatives the causer (and causing event) occurs in the matrix clause but the causee (and caused event) occurs in the embedded clause.

(9). [John *made* [Mary *type* the letter]]

Languages, however, are not uniform in organizing elements in analytic causative constructions. For instance, Shibatani and Pardeshi (2002:103) report that Korean can express the causee argument as part of the matrix or embedded clause. This is reflected in different case marking of the causee; when marked as dative or accusative the causee functions as the object of the matrix verb but when it is marked in nominative case it functions as the subject of the embedded verb (10a-c).[5] We return to the discussion on what regulates the grammatical relations of analytic causatives later in section 3.3.

Korean (Shibatani and Pardeshi 2002:103)

(10)a. Ai-ka chaek-ul ilk-etta
child-NOM book-ACC read-PAST.IND
The child read the book.

b. Emeni-ka [ai-***ka*** chaek-ul ilk-key] hay-etta
mother-NOM child-**NOM** book-ACC read-COMP do-PAST.IND
Mother made the child read the book.

c. Emeni-ka ai-***ekey/lul*** [chaek-ul ilk-key] hay-etta
mother-NOM child-**DAT**/**ACC** book-ACC read-COMP do-PAST.IND
Mother made the child read the book.

A similar situation obtains in Akan which has analytic causatives. The analytic causative verb in the language is *má* 'to cause, make' which is a grammaticalization of the verb *má* 'to give'. The analytic causative construction in Akan has been analysed as biclausal (Saah 1989; Boadi 2005b; Ameka 2005). According to Saah (1989:23), "in the causative construction, the subject of the verb *má* is not the subject of the second verb [but] NP^2 … is the subject of the sentential complement." Thus, (11) consists of two clauses: the causer (Kofi) is the subject of the matrix causative verb while the causee (Kwame) functions as the subject of the embedded verb of effect *sú* 'cry'. Consequently, Ameka (2005:10) also concludes that "this construction is therefore not an SVC."

(11). [Kofi mà-à [Kwame sù-ĭ]]
Kofi cause-COMPL Kwame cry-COMPL
Kofi caused/made Kwame cry.

This, however, is not the whole story. In (11), we note that even though there are two clauses, the matrix and embedded verbs take the same tense/aspect marking (i.e. the Completive aspect). In this way, the analytic causative resembles a serial verb construction (SVC) (Osam 1994a and 2004; Lord et al. 2002). Again, to say that the causee argument is not the object of the matrix verb but just the subject of the embedded verb does not take into account the fact that the causee argument may be realised either as a grammatical subject (12a) or object (12b) when pronominalized.

(12)a. Papa nó má-à ***ò***-sú-ɪ̀ (Fa.)
man DET cause-COMPL **3SGSUBJ**-cry-COMPL
The man made him/her cry (Osam 2004:42).

b. Papa nó mà-à ***nó*** sú-ɪ̀
man DET cause-COMPL **3SGOBJ** cry-COMPL
The man made him/her cry (Osam 2004:42).

For this reason, Osam (1994a, 2004) proposed that (12a-b) be regarded as 'switch subject' or 'object-subject' SVC. In chapter four, however, it is shown that the two sentences (12a-b), though semantically and syntactically related, do not exhibit the same syntactic properties. For that reason, it would be difficult to subsume one construction under the other as one and the same type of construction. Paradoxically, the biclausal and SVC analysis each holds pieces of the puzzle of the syntax of analytic causatives when one examines closely the different subtle semantic and syntactic properties of the constructions. Significantly, Akan analytic causatives inform us that the organization and representation of concepts and ideas in language may be motivated by semantic/pragmatic functions that speakers want to communicate and speakers exploit different syntactic mechanisms to achieve this.[6]

3.2 Semantics of Causation

3.2.1 Event Types of Causation

Causation may be analyzed with regard to the configuration of event involved in the interaction. Depending on the context of an interaction, we may be able to isolate distinct properties of the causer (and causing event) and the causee (and

caused event). In this vein, Stefanowitsch (2001) suggests three major event types which may be expressed in analytic causative constructions in English namely, MANIPULATION, TRIGGER and PROMPT configurations. The MANIPULATION configuration may be defined as a situation where a stronger agent (a causer) intentionally acts on a weaker patient (a causee) causing the latter to undergo a (physical) change of state (Stefanowitsch 2001:96). Thus, this configuration involves an application of (physical) force by an agent on a patient to overturn the state of the patient. Stefanowitsch (2001:100), however, notes that often the causer's action in the MANIPULATION configuration may involve a non-physical act such as verbal communication but because the agent is conceived as wielding power or authority to punish the patient should he or she refuse to acquiesce to the request of the agent, the patient accedes to the wishes of the agent. The former instance may be referred to as *coercive* MANIPULATION and the latter, *directive* MANIPULATION.

It can be noted, however, that a single causative sentence may involve coercive MANIPULATION or directive MANIPULATION depending on contextual information. Thus (13) may involve a situation where John forces Kim's hand to open the door which case would involve coercive MANIPULATION or John simply asked Kim to open the door and out of regard for John, Kim complied (directive MANIPULATION).

(13). John made Kim open the door.

As shown by Stefanowisch (2001:108-124), TRIGGER and PROMPT configuration differ from MANIPULATION in that the former do not involve any physical action of an agent on a patient in the interaction. Rather TRIGGER and PROMPT both only describe a situation where an agent's action induces an emotional, perceptual or psychological change of state in a patient. Even so, in TRIGGER, the patient does not exercise any control over the caused emotional or perceptual state. On the other hand, in PROMPT, the patient decides to undergo a psychological state as a result of an agent's action. The examples in (14a-b) illustrate the difference between TRIGGER and PROMPT.

(14)a. [*About Dicken's "A Tale of Two Cities"*] Even when *I read it now*, it still MAKES me cry, the ending of it (Stefanowisch 2001:114, emphasis in original).

b. [*About the high taxes on cigarettes*] I used to smoke, you know, and that [i.e. the taxes] would have been enough to MAKE me give them up (Stefanowitsch 2001:119, emphasis in original).

As (14a) illustrates, a story causes an involuntary reaction in the reader causing him to cry, thus, demonstrating a TRIGGER configuration. However, in (14b), a smoker decides to give up smoking because of the hike in the price of cigarettes thus illustrating a PROMPT configuration. Notice, however, that in both sentences, the causer is not an entity per se but rather an activity or event (Stefanowitsch 2001).

Stefanowitsch's (2001) proposal on the different event types of causation constitutes a neat attempt at organizing a set of causative expressions and their semantic properties. The major event types of causation proposed by Stefanowitsch (2001) have distinct features and can each be distinguished from the other. Also, the event configurations proposed in her study provides cognitive insight into the internal properties of a causative event by individuating different components of the interaction and extracting their various properties in the interaction. Furthermore, Stefanowitsch's (2001) study emphasizes the importance of context in analyzing a causative expression as a single expression may involve more than one configuration depending on the contextual information available to the speaker or addressee alike.

It can be noted, however, that the three event types of causation proposed by Stefanowitsch (2001) involve only analytic causatives and do not include morphological or lexical causatives. In chapter five, it will be proposed that there are two additional major event types of causation namely, CREATE and ALLOW, expressed in causatives in Akan which may be distinguished based on their distinct semantic properties. It will also be shown that the major event types of causation may also be compatible with lexical causatives in Akan.

3.2.2 Direct vs. Indirect Causation

Perhaps the most articulated semantic distinction made regarding the causative is the dichotomy between direct and indirect causation ((Shibatani 1976; Shibatani and Pardeshi 2002; Shibatani and Chung 2002; Yang 1976; Kemmer and

Verhagen 1994; Wolff 2003; Dixon 2000; Talmy 2000). This notwithstanding, Shibatani and Pardeshi (2002:88) note that "unfortunately, these terms have been used rather loosely, sometimes without a rigorous definition and sometimes in slightly different senses depending on the authors and context." In other words, the parameters used in distinguishing these semantic parameters differ from linguist to linguist probably because "what types of situations languages choose to treat as direct and which are mediated varies" (Kemmer and Verhagen 1994:122).

According to Agyekum (2004:219-221, italics in original), "direct causation is a semantic relation in which the *causer directly acts upon the causee*" but indirect causation is where "the real originator of the causation does not perform the act him/herself." Thus, while direct causation involves direct manipulation of the causee by the causer, indirect causation involves no such contact between the causer and the causee. Shibatani and Pardeshi (2002), however, show that direct and indirect causation involves different spatio-temporal configurations of the causing and caused events. They state:

> The ultimate defining feature of direct and indirect causation is the spatio-temporal configuration of the entire causative event, rather than the nature of the causee. The notion of direct causation emanates from conceptualization of a causative situation as involving the same spatio-temporal profile for the causing-event segment and the caused-event segment (Shibatani and Pardeshi 2002:90).

Thus, while direct causation essentially involves a single event with a conflated spatio-temporal profile, indirect causation specifies two events, one leading to the other, each with isolated spatio-temporal configuration (Shibatani and Pardeshi

2002). For example, while (15a) can only imply that John did something to Bill on Sunday and Bill died in the process, (15b) allows for two interpretations: (a) John did something sometime prior to Sunday which caused Bill's death, or (b) John did something to Bill on Sunday so that he died on Sunday. In effect, in direct causation both causing and caused events are anchored in the same temporal profile (15a), while in indirect causation these two events may be separated in time (15b) (see Fodor 1970; Wierzbicka 1975; Shibatani 1976 for further distinctions).

(15)a. John *killed* Bill on Sunday.

b. John *caused* Bill to die on Sunday.

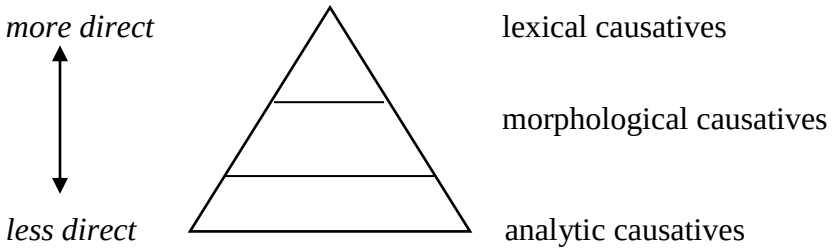
Haiman (1983:782) argues that there is iconic transfer of conceptual structure unto grammatical structure in the expression of causative events and, thus, the length of a causative form (or construction) signals the level of integration between the cause and caused events. He proposes that grammatical structure is iconically motivated by two principles:

(i). the linguistic distance between expressions corresponds to the conceptual distance.
(ii). the linguistic separateness of an expression corresponds to the conceptual independence of the object or event which it represents.

Payne (1997:181) illustrates this iconic form-function correspondence with an "iconicity pyramid" where lexical causatives which are morphologically more compact occupy the topmost niche and represent more direct causation. On the

other hand, morphological and analytic causatives are considered to express less direct causation (Fig 2.1).

Figure 2.1. ***Iconicity Pyramid*** **(Payne 1997:181)**



Payne's (1997) "iconicity pyramid" however, shows that directness of causation is more of a semantic continuum than a discrete notion.[7] Also, even within a single language there may be irregularities in the supposed form-function alignment. For example, Yang (1976:63) reports that in Korean "both lexical and clausal causatives may express both direct and indirect causation." Likewise, Armendáriz (2004) notes that in Warihio (Southern Uto-Aztecan) in certain contexts the use of lexical causatives produces only an indirect causative meaning. For example, although (16) involves a lexical causative, the causer's action is indirect; the twisting of the *panéwa* is through John's indirect help.

Warihio (Armendariz 2003:17)

(16). Waní pi'ri-na panéwa
John twist-CAUS-PAST panéwa
John twisted the panéwa.

As Agyekum (2004:219) observes, in Akan, even though lexical causatives are primarily used to express direct causation, analytic causatives may also be used to express a range of direct causation meaning. We will explore this possibility in chapter five.

3.3 Syntax of Causatives

The syntax of causative constructions has "important theoretical implications" in the study of grammatical structure as a whole (Shibatani 1976:3).[8] Over the years, there have been a number of studies on the syntactic properties of the clause structure of causatives in different languages (Gerdts 1986 and 1990; Alsina 1992; Harley 1995 and 2008; Kemmer and Verhagen 1994; Lee 1996; Stefanowitsch 2001). One of the most discussed issues in the syntax of causatives has been the grammatical relations and coding of the causee argument in a causative construction (Comrie 1976; Cole 1976 and 1983; Wali 1980; Kozinsky and Polinsky 1993; Sumbatova 1993; Kemmer and Verhagen 1994; Miyagawa 1999). Interestingly, even within a single language there may be differing accounts on how to analyse the syntactic properties of the causee argument and its implications for the clause structure of the causative.[9] Even so, there have been two main approaches to the analysis of causative structure with regard to the properties of the causee argument. On the one hand, it has been argued that the role of the causee in causatives can be predicted solely by syntactic principles; on the other, it has been suggested that the grammatical function of the causee is motivated by semantic principles. Below, we will review these proposals and highlight to what extent they are able to account for a wide range of data across languages.

3.3.1 Comrie (1976)

Comrie (1976) presents the syntax of noun phrase arguments, especially causee and affectee noun phrases (NPs) in causatives in a cross-linguistic study. He discusses causative constructions with an underlying bi-clausal structure, where the matrix clause contains the causer argument and the embedded clause contains the causee and affectee arguments. Comrie's (1976) analysis is basically geared toward identifying and predicting the case assignment of the individual noun arguments realised in the embedded clause. He argues that the case of the causee and affectee NPs are syntactically derived from two main syntactic principles: the *doubling constraint* and the *case hierarchy*. According to him, on the one hand, the doubling constraint prevents subjects and objects from doubling or duplicating in simple clauses while the case hierarchy predicts the case assignment of object NPs in the causative clause. He states:

> The surface exponency of the embedded subject depends on the syntactic arguments of the embedded verb: if it has no direct object, then the embedded subject appears as direct object; if it has a direct object but no indirect object, then the embedded subject appears as indirect object; if it has both direct and an indirect object, then the embedded subject appears as one of the other oblique cases (Comrie 1976:262).

Thus in a causative construction, case assignment of arguments follows the hierarchy in (16).[10]

(16). Subject > Direct Object > Non-Direct Object > Other Oblique

Comrie (1976) cites Turkish as a paradigm case. In Turkish, the embedded subject, the causee NP, receives the next case on the case hierarchy in (16) after other NPs in the embedded clause have been case marked.

Turkish

(17)a. Ali **Hasan-i** ől-dűr-dű
Ali Hasan-**DO** die-Caus-Past
Ali caused Hasan to die, killed Hasan (Comrie 1976:263).

b. Dişçi mektub-u **műdűr-e** imzala-t-tı
dentist letter-DO **director-IO** sign-Caus-Past
The dentist made the director sign the letter (Comrie 1976:263).

c. Dişçi Hasan-a mektub-u **műdűr** tarafından goster-t-ti
dentist Hasan-IO letter-DO **director** by show-Caus-Past
The dentist made the director show the letter to Hasan (Comrie 1976:263).

Thus in (17a) the causer NP is the subject and the causee NP receives direct object (DO) marking. However, in (17b), because the embedded verb has a direct object (letter) the causee takes indirect object (IO) case. Also, in (17c), we see a further demotion of the causee NP such that where the embedded verb has both direct and indirect objects the causee appears as an oblique.

Comrie (1976) identifies four main syntactic paradigms of causative constructions across languages (18):

(18). Syntactic paradigm of causatives (Comrie 1976:264-265)

a. there is no syntactic restriction on the formation of causative constructions

b. doubling on the syntactic positions subject, direct object and indirect is forbidden

c. where the restrictions on doubling require that some constituent be removed, it is always the embedded subject that is so removed, either by being omitted or by being demoted down the hierarchy

d. when the embedded subject is demoted down the hierarchy, it is demoted stepwise

Comrie (1976) used data from a number of languages to show that the syntactic paradigms in (18) has cross-linguistic validity and the case hierarchy is a reliable parameter in analysing the syntax of causatives, especially with regard to case marking of the causee argument. However, Comrie (1976:264) concedes that "not all languages conform exactly to the paradigm" but where languages differ from the paradigm case they do so in "only one or two respects." Thus Comrie (1976) argues that where languages do not follow the case hierarchy in marking the causee (and other arguments) in the causative this is often due to an independent syntactic condition internal to the language. For instance, in a language where the notion of indirect object may not be relevant, as is the case in Akan and some Bantu languages, the case hierarchy may not be able to predict the coding of arguments in the causative; rather the syntactic role(s) of the arguments may be regulated by some language-specific syntactic constraints.[11] In chapter four, we will look at the extent to which the case hierarchy accommodates the data on Akan causatives.

The variation encountered in many languages in the coding of the causee NP, however, has led many to question the validity of Comrie's analysis. For example, Dixon (2000:54) observes that even though Comrie (1976) emphasizes that the common tendency of causee NPs in a causative structure is what is predicted by the case hierarchy (paradigm case), "in fact this pattern is rather rare." He indicates that languages differ considerably in the way they realise causee arguments and even in a single language, there may be alternative means of expressing the embedded subject (i.e. the causee argument). Kulikov (2001) also adds that Comrie's generalisation of the case of the causee in the causative through the case hierarchy has been overstated because

> Probably no language conforms exactly to what Comrie calls the "paradigm case" … and even in languages which, at first glance, meet Comrie's generalizations perfectly, like French, we are often faced with an alternative case marking (Kulikov 2001:890).

The apparent problem with Comrie's (1976) proposal is that it relies solely on syntactic principles in accounting for the grammatical relations in causatives. But, as Kemmer and Verhagen (1994) have noted, relying on purely formal syntactic principles in identifying case assignment in the causative is bound to run into problems because the assignment of case in clauses may be semantically motivated. Thus Kemmer and Verhagen (1994:124) conclude that analysing and understanding the semantics of the various case systems in language would provide a better account of how case assignment (and syntactic roles) in the causative can be accounted for more effectively.

Consequently, many accounts propose semantic motivations in accounting for the syntax of the causative with regard to the case of the causee NP and other arguments in the clause (Cole 1983; Wali 1980; Alsina 1992; Kozinsky and Polinsky 1993; Kemmer and Verhagen 1994).

3.3.2 Cole (1983)

Cole (1983) presents an alternative proposal in which the syntactic roles of the causee and other noun phrases are predicted and explained from a semantic point of view. Cole (1983:115-116) proceeds from the assumption that "the derived syntactic role of the causee in clause union causatives ... is due to the semantic (or pragmatic) role of the causee vis-a-vis the predicate of the complement clause rather than to primarily syntactic factors." He notes that the practice of relying on syntactic rather than semantic factors in accounting for the case of the causee in causative constructions across languages can be attributed, in part, to the fact that "semantic principles governing the assignment of the syntactic role of the causee has become grammaticized" in many cases and may thus not be readily discernible (Cole 1983:116). Nevertheless, in many languages, morphological case affixes carry semantic content (see Kemmer and Verhagen 1994).

Cole (1983) notes that in the derived structure of the causative the complement subject of an intransitive verb (causee argument) is realised as direct object while the complement subject of a transitive verb (causee argument) appears as an indirect object in the clause. The assignment of direct and indirect object roles to the causee in intransitive and transitive causatives, however, is "determined by the

semantic role of that NP in the complement clause" (Cole 1983:117). According to him, the distribution of syntactic roles for complement subjects (causee) is regulated by the degree of agentivity exhibited by the nominal in the complement clause. Thus Cole declares:

> Agentivity is not merely one of a number of semantic parameters affecting the derived grammatical role of the complement subject. It is ***the*** relevant semantic parameter. Secondly, although the specific grammatical roles associated with agentive and non-agentive complement subjects vary from language to language, the principle determining those roles are the same (Cole 1983:125, emphasis in original).

Agentivity involves notions such as animacy, voluntariness or volition of the complement subject in the clause. Cole (1983) indicates that some verbs like *kill* require highly agentive nominals while others like *see, watch, melt* and *die,* require less agentive nominals (see Table 2.1). Sensu lato, highly agentive causees are assigned grammatical role(s) associated with agentive nominals while less agentive causees receive grammatical role(s) associated with less agentive nominals.

Table 2.1. *Hierarchy of agency* (Cole 1983:131)

Highly Agentive	**Agentive**	**Experiencer**	**Patient**
Animate; voluntary; affects patient e.g. *kill*	animate; voluntary does not affect patient. e.g. *watch*	animate; non-voluntary; does not affect patient e.g. *see*	not necessarily animate; non-voluntary; e.g. *melt*

Cole (1983) shows that in languages where there are a number of case markers there is systematic alignment of the semantic functions of the case markers with the semantic role(s) of the causee NP in the causative clause. For example, accusative is usually marked on non-volitional, non-agentive causees while instrumental case appears on volitional, agentive causee NPs (e.g. Bolivian Quechua; Cole 1983:118). Other morphological case are associated with causee NPs with different degrees of agentivity, volition and autonomy of the causee in the causative. In other words, case marking of the causee in the causative is motivated by the degree of agentivity or affectedness of that noun argument. Cole (1983) suggests that the pattern in Table 2.2 is employed in assigning case to the causee in many languages. Table 2.2 shows that the more agentive a causee is the more likely it would receive a higher case marking; inversely, the more affected the causee is in the causative sentence the more likely it would be marked with a lower case.

Table 2.1. ***Case marking and degree of autonomy and affectedness of causee*** **(based on Cole (1983))**

Degree of affectedness ↓	**Case of causee**	**Degree of autonomy** ↑	**Case of causee**
high	zero (Ø) marking (e.g. French)		instrumental
	accusative (e.g. Japanese, Hungarian)		dative
	dative (e.g. Japanese)		accusative
low	instrumental (e.g. Kannada)		zero (Ø) marking

The patterns in Table 2.2 however might not be strictly followed by some languages. As Cole (1983:125) explains even though the assignment of case to the arguments in the causative is regulated by agentivity of the nominal in question "the choice of cases should reflect a contrast in roles appropriate in that language to the agent-nonagent distinction." In other words, while the specific case which may be assigned to a nominal in the causative may be different from language to language the parameter assigning any case to an argument is always motivated by the agent-nonagent role (degree of agentivity) of that nominal. One advantage of this proposal is that it leads us to expect differences in the case of the causee in causatives and provides a systematic way of accounting for the various syntactic marking of the causee argument. Thus, the so-called "exceptional cases" in the syntactic marking of the causee are in reality expected and can be better analyzed by looking at the assignment of grammatical relations vis-à-vis the function of nominals in simple clauses.

In chapter four, however, I argue that the different syntactic marking of the causee argument in Akan causatives is not predicted by a case hierarchy (as claimed by Comrie 1976) neither is it motivated by the degree of agentivity of the causee in the causative interaction (as Cole 1983 proposed). Rather, the alternative marking of the causee is as a result of restructuring of a complement sentence into a partial lexicalised serial verb construction in the language.

4.0 THEORETICAL FRAMEWORK

4.1 Force-dynamics and Causation (Talmy 1988, 2000)

Over the years, research in language has emphasized the importance of certain categories like "space", "tense", "negation" and "motion" in human thought and cognition (Podlesskaya 1993; Talmy 2000). Such categories are usually referred to as "fundamental" or "universal logical concepts" because they are expressed morphologically across languages (Podlesskaya 1993:165). These fundamental concepts are thought to be part of the conceptual system of human language, hence, their crosslinguistic occurrence. In this respect, Talmy (1988, 2000) identified an additional notional category which he showed to be fundamental to human language namely, *force-dynamics*.

Force-dynamics (FD), according to Talmy (2000:409), involves "how entities interact with respect to force" which may include the "exertion of force, resistance to such a force, the overcoming of such a resistance, blockade of the expression of force, removal of such blockade." Thus, FD encompasses the expression of force opposition between entities and the result(s) of such force interaction over time. This means that causation is essentially a force-dynamics concept and FD is a "generalization over the traditional linguistic notion of "causative"" (Talmy (2000:409). In this study, I adopt FD in representing the semantic properties of different causative expressions in Akan. Thus in what follows I introduce the FD framework and show how it is used to examine the semantics of causative expressions.

4.2 FD Notations

The FD model employs the following specialised notations to denote basic concepts in representing force-dynamic interactions (Talmy 2000:414) (19a-d).

(19)a. *Force Entities*

Agonist (AGO): 

Antagonist ANT): 

b. *Intrinsic Force Tendency*[12]

Toward Action: 

Toward Rest: ●

c. *Balance of Strengths*

Stronger Force Entity: +

Weaker Force Entity: −

d. *Result of the Force Interaction*

Action: 

Rest: 

In FD, two entities (AGO and ANT) interact with regard to force. Each of these entities is reckoned as having an intrinsic force tendency either toward movement or rest at any given time. However, for force interaction to be possible the two force entities must display opposite intrinsic force tendencies. Again, in force

interaction, the AGO and ANT do not have equal strength; one must be weaker and the other stronger at any given time. In FD, the result of the force interaction is stated in terms of the state of the Ago with regard to force after the interaction. In other words, every force interaction is initiated with the intention or potential of influencing the AGO to manifest a different force tendency and this goal remains the focal point in the expression of force-dynamic interactions.

4.3 Basic FD Patterns

The nature of impingement between entities engaged in a force interaction can be distinctly represented in the FD model. The patterns demonstrate, in each case, the possible resultant states and also provide access to foregrounding information exhibited in causative constructions.

4.3.1 Steady-State FD Patterns

The steady-state pattern underlies all complex patterns of FD in language (Talmy 2000:413). The interaction between the AGO and the ANT yields one of four results at any time (20a-d):

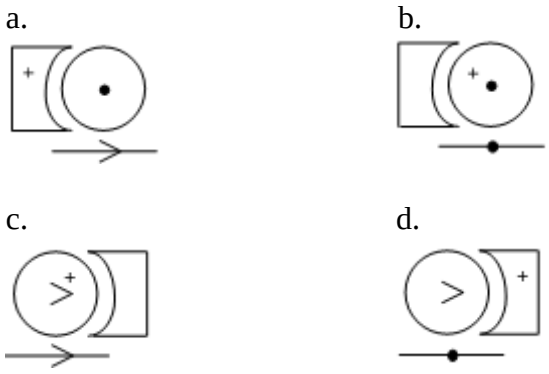
(20)a. The AGO's original state which is at rest is overturned by the stronger force of the ANT, causing it to move.

b. The AGO successfully resists the ANT's force and remains at rest because it retains greater strength in the interaction.

c. The AGO, although resisted by the ANT, maintains its original state which is toward action because of its greater strength.

d. The AGO's action is blocked by the stronger ANT, causing the AGO to halt its activity.

Figure 2.2. ***Steady-state force interactions*** **(Talmy 2000:415)**



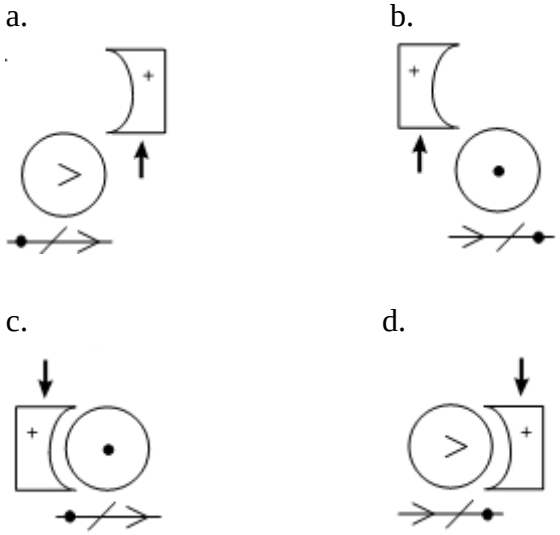
The patterns in (2.2a) and (2.2d) demonstrate what may be referred to as prototypical causation (Talmy 2000:418). This involves "positive impingement" of the ANT (because of its greater strength (+)) on the AGO so that the AGO eventually displays a state opposite its original state (Talmy 2000:420). Since the interaction involved in (2.2a) and (2.2d) is steady, that is, it continues over a considerable stretch of time, it illustrates *extended causation* (Talmy 2000:418). Thus, the causative situation, as generally defined, would be represented as in (2.2a) and (2.2d), but also with various additional features where necessary.

The patterns in (2.2b) and (2.2c), however, demonstrate that not all force interactions between AGO and ANT result in a change in the state of the AGO. Such patterns illustrate what Talmy (2000:415) refers to as the "despite category" where a stronger AGO successfully resists the ANT's force and maintains its original state. Thus, even though the despite category is usually not analysed as causative it is closely associated with causation, specifically 'failed causation.'

4.3.2 Shifting Force-Dynamic Patterns

Force-dynamics can also be found in shifting patterns. In this pattern, the interaction between the ANT and the AGO is not steady, but shifts over time to yield a different result. This pattern is of two types: (i) disengagement of the ANT from the AGO ((2.3a) and (2.3b)); (ii) sudden introduction of the ANT's force on the AGO (2.3c) and (2.3d).

Figure 2.3. ***Shifting force interactions*** **(Talmy 2000:418)**



The arrows in the diagrams (2.3a-d) indicate the shifting patterns or movements of the ANT; arrows pointing upwards indicate removal of the ANT's force on the AGO (2.3a, b) while those pointing downwards depict the introduction of the ANT's force on the AGO (2.3c, d). Also, in (2.3a) and (2.3d), each FD configuration has two resultant states separated by slash marks; the resultant state on the left represents the result of the interaction between ANT and AGO before the shift in ANT's position, while the resultant state on the right shows the result

of the interaction after the shift of the ANT. Thus the slash mark indicates the result before and after a shift in the pattern of interaction.

Fig (2.3a) and (2.3b) illustrate the notion of *letting* which involves the removal of the ANT's force on the AGO resulting in the AGO eventually manifesting its original state or activity, which in (2.3a) is towards motion but in (2.3b) is towards rest (Talmy 2000:419). Thus, (2.3a) represents *onset letting of motion* while (2.3b) shows *onset letting of rest*. It must be noted however, that in both cases, despite the removal of the ANT's force on the AGO, the ANT remains the stronger of the two entities, thus, the resultant state displayed by the AGO is not necessarily by virtue of the AGO's force alone. In other words, in (2.3a) and (2.3b), the AGO can continue to display its original state only with the permission of the ANT, hence, the ANT may be considered as ultimately responsible for the eventual state of the AGO.

On the other hand, the diagrams in (2.3c) and (2.3d) present us with a relatively different scenario. In (2.3c), an ANT with a greater force suddenly acts on an AGO who is at rest, causing the AGO to move. Also, in (2.3d), an AGO may be suddenly blocked by a stronger ANT causing the AGO to undergo a change of state. As Talmy (2000:418) notes, the pattern in (2.3c) is "most associated with the category of causation" where an object (usually) at rest is suddenly acted upon by another entity resulting in a change of state of the latter. Thus, the pattern in (2.3c) is referred to as *onset causation*, emphasizing the sudden nature of the ANT's

action. Intuitively, then, all patterns of causation, including steady-state patterns, may begin as onset causation.

4.4 Domains of Force-dynamics

The FD model extends force interactions beyond the physical to the abstract. Talmy identifies intra-psychological and inter-psychological domains as areas where force-dynamics operate.

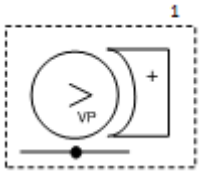
4.4.1 Intra-Psychological (Psychodynamics)

According to Talmy (2000:430), in language notions which are usually associated with physical interactions like *pushing, blocking* and *allowing* may be extended into psychological domains through systematic metaphor. The FD model makes it possible to represent the expression of force interaction as occurring within a single psyche. This domain involves a divided self with two entities which are engaged in force interaction namely, a *desiring* part (AGO) and a *blocking* or *spurring* part (ANT) (Talmy 2000:431). The two entities with opposing force quantities form part of the same psyche; hence, the interaction may be depicted as taking place in a *divided self* (2.4a-c).

Figure 2.4. ***The divided self*** **(Talmy 2000:431)**

a. b.

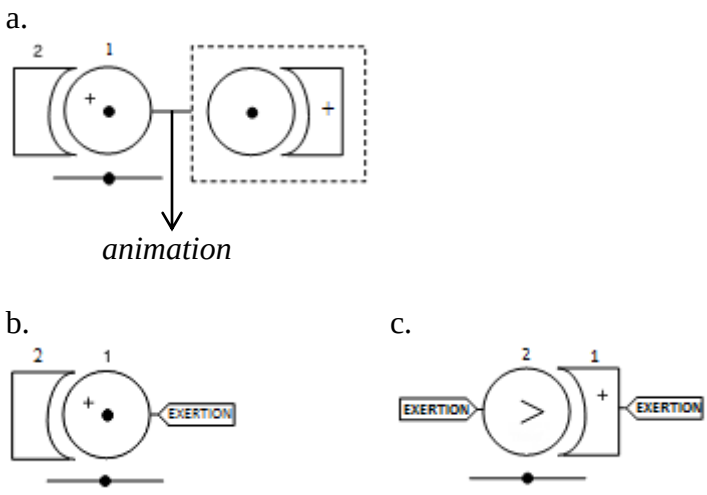
c.



As illustrated in (2.4a) and (2.4c), the expression of intra-psychological causation may involve three different patterns. In (2.4a), the desiring part of the divided self, the AGO, is blocked by a stronger ANT which curtails the activity of the AGO. Talmy (2000:432) illustrates this pattern with the sentence *He held himself back from responding* where a stronger ANT (the blocking part of the self) which is expressed as the subject successfully prevents a weaker AGO (expressed as a reflexive object *himself*) from manifesting its action. In (2.4b) though, we note that the stronger ANT may act as a spur by acting on the AGO which is at rest, causing it to perform an action. The pattern in (2.4c), however, demonstrates that intra-psychological causation may be lexicalized; the two opposing entities in the interaction may not be individually specified in a sentence rather, the entire psyche may be expressed as the subject. Thus, in this pattern, the interaction between the elements in the divided self are conflated into one lexical item. This is why in (2.4c) the AGO and ANT are not individually numbered but the whole psyche is expressed as the actor. In chapter five, I will demonstrate that intra-psychological causation underlies a specific event type of causation namely, TRIGGER and PROMPT configurations.

Talmy (2000:433) proposes underlying psychological force-dynamics as a property of all sentient entities. He asserts that while it may appear that the force manifestations of entities (sentient and non-sentient) emanate from the strength of their physical bodies, in essence, sentient entities have a renewable force source namely, the psyche. This fact is reified in instances where an AGO's physical strength when compared to an ANT's physical force is far weaker but the AGO successfully resists the ANT's pressure. For example, in *The student resisted pressure from his classmates to smoke a cigarette*, when the strength of the AGO (student) and ANT (his classmates) are measured based on their physical quantity alone, the AGO proves far weaker. Therefore, we can say that the successful resistance of the AGO must issue from a source which is not physical (Fig 2.5).

Figure 2.5. ***The psyche as force source in sentient entities*** **(Talmy 2000:434)**



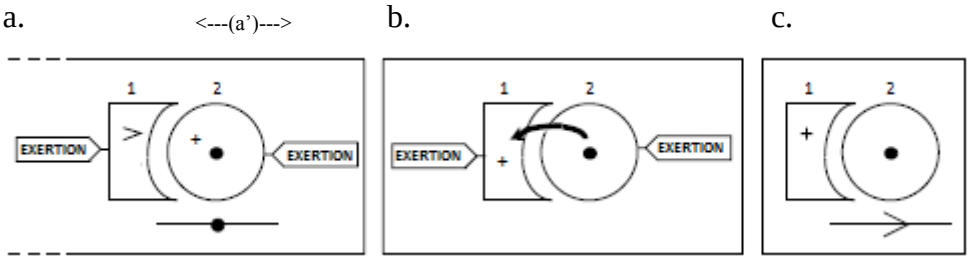
The diagrams in (2.5a) and (2.5c) illustrate the point that all sentient objects are involved in a continuous maintenance of expenditure of effort in order to manifest their force tendencies in force-dynamic interactions (Talmy 2000:433). As shown in (2.5a), the underlying psychological force of the sentient AGO is sustained by a psyche which imbues the AGO with force through *animation*. The supply of force through animation by the psyche to an entity in a force interaction can be interpreted as an exertion of force by the respective entity, be it the AGO (2.5b) or the ANT and AGO (2.5c). This characterization is critical to understanding intra-psychological causation because, as Talmy (2000:435) indicates, since "by itself, the body lacks an intrinsic force tendency… it is the psyche that imbues the body with force properties."

4.4.2 Inter-Psychological (Sociodynamics)

Force-dynamics may be expressed between two distinct psyches through metaphorical extension of concepts of *push* or the exertion of *pressure* of one entity on another (Talmy 2000:438). In social interactions, even though the expression of exertion of force by a (sentient) entity on another is not physical, the interaction is still conveyed by lexical items which express physical force suggesting a metaphorical relation between the two domains. For example, in *He is under a lot of pressure to testify in court*, the subject (AGO) is conveyed as being under the influence of an unexpressed entity (ANT) to undergo a certain change of state. In this instance, the interaction is not physical, but is between the psyches of the AGO and the ANT. It can be noted, however, that force interactions between psyches may involve phases of force negotiations (exertion, maintenance

or yielding) between the opposing entities (Talmy 2000:439). Thus, the sentence *He is under a lot of pressure to testify in court* may present the phases illustrated in (2.6) below.

Figure 2.6. ***Phase/factivity patterns in sociodynamics*** **(Talmy 2000:439)**



As we noted in (2.5) above, sentient entities engaged in a force interaction rely on the supply and maintenance of force by a psyche through animation to manage their force expenditure. In (2.6a), we observe an ANT with a force tendency toward action which acts on an AGO at rest. However, since the AGO has a stronger balance of strength, for the ANT to succeed in overturning the AGO's state, the AGO must relinquish its stronger force to result in a shift in greater strength from the AGO to ANT (2.6b). It is only after shift in strength has been successfully carried out that the ANT may overturn the state of the AGO. Thus, in *He is under a lot of pressure to testify in court* the subject (he) which is in control of his action may react to the pressure by the unexpressed entity by deciding to yield and eventually testify in court. Conversely, the AGO may maintain its force tendency during the interaction, successfully resisting the pressure of the ANT. Of course, the nature of each phase of action is informed by the speaker's factitive

knowledge, his knowledge of the "occurrence or nonoccurrence of portions of the sequence" (Talmy 2000:436).

Thus, overall, the force-dynamics framework provides a neat and convenient way of decomposing the causative situation into its relevant properties through parametric notation and representation.

4.5 Force-dynamics: Strengths and Weaknesses

Talmy's *force-dynamics* model forms part of a larger cognitive model which represents the organization of concepts specified in grammatical structure. The FD model recognises the recurring morphosyntactic and semantic motivations of causative constructions across languages as emanating from the grammatical subsystem of conceptual structure. Thus, causation is placed at par with other notional categories such as tense/aspect, negation, number and gender which have grammatical representation in language (Talmy 2000:410-411). This level of analysis, therefore, leads us to expect abstractions from the fundamental notion of causation in the real world into other domains through various cognitive processes.

Since its proposal, Talmy's *force-dynamics* has been employed (and usually expounded) in many theories on causal structure and verbal lexicalization (see for example, Wolff 2003, 2007; Croft 1991, 1998; Jackendoff 1990). Others have applied the model in analysing the causative in different languages (Vecchiato 2003 for Italian; Lofti 2008 for Modern Persian; Lai and Chiang 2003 and Chiang 2003 for Hakka).

One advantage of the FD model is that it decomposes the causative into 'finer primitives' to include notions of *allowing*, *enabling*, *helping* and *preventing* (Talmy 2000:409). In decomposing the causative into finer primitives the FD model leads us to expect that in language sometimes the one and the same morpheme or construction may be used to express different notions or patterns of force-dynamics between interactive entities. For instance, in Akan, the causative morpheme *má* may express a variety of concepts such as allowing, enabling, preventing and causing depending on the context of the utterance. Thus, rather than analyse the different meanings of the causative morpheme independently, in FD we are able to show the principled relationship between the different notions expressed by the predicate and establish it simply as a force-dynamic functional predicate in the Akan language.

The FD model is flexible. In representing different notions of causation the model uses parametric variation for the interactive entities and the pattern(s) of impingement involved in the causative situation. As noted by Jackendoff (1990:130) one of the strengths of the FD model lies in the fact that it is based on parametric variation which can be decomposed to generate additional features; a change in the value of one of the parameters yields a new conceptual primitive (causative type). In other words, because the FD model relies on notations (with parametric features/values) a manipulation of the features in the causative paradigm may result in the realization of different patterns/notions of the causative complex. Thus, in principle, the model should be able to represent all patterns of causation expressed in language.

Also, Talmy's (2000) FD model sheds insight into the lexicalization of various force-dynamics concepts in language by providing a systematic way of representing force interactions expressed in different lexical forms. For example, Talmy (2000:432) shows that certain expressions such as *be civil*, and *refrain* contain causative meaning if attention is given to their force-dynamic properties. This analysis is important for languages which employ metaphorical processes in lexicalizing causation. In Akan, for instance, various expressions such as *hyɛ ho so* 'restrain' or *di ho so* 'to exercise self-control' represent lexicalization of causation whose verbal semantics can be properly accounted for and represented using the FD model.

Significantly, The FD model allows us to account for causation in less physical, even abstract domains such as within a single psyche (intra-psychological), between two (or more) psyches (inter-psychological/social) and in discourse and argumentation. The FD model departs from traditional analysis of the causative as involving only physical situations. In showing that causation may be extended into abstract domains in language the model emphasizes force-dynamics as a fundamental concept in human cognitive organization which is generalised in language. The FD model, thus, provides an integrated framework which can accounts for expression of force-dynamic relations between entities in both physical and non-physical domains.

The Force-dynamics model, however, has been criticised by some scholars as lacking explanatory power because it only provides a diagramatic representation of force interactions but these systems do not have meaning in themselves (Goddard 1998). It seems, however, that this criticism rather highlights the overall objective of the model as *representing* force interactions as conceptualized in language and showing how grammatical and lexical forms encode such meanings. In any event, meaning is encoded in the forms used not in the *representation*.

In chapter three, I present the different morphosyntactic forms in which causation may be expressed in the Akan language.

ENDNOTES

[1] All references to Talmy (2000) are from volume 2 of his book *Toward a Cognitive Semantics*.

[2] Gilquin (2010:150) argues that expression of prototypical causation displays Haiman's (1985) 'principle of iconic sequencing,' therefore, "the prototypical ordering of linguistics elements in a periphrastic causative construction should reflect the ordering of the participants along the action chain."

[3] Many thanks to Hazel Mitchell from the Department of English Language and Linguistics, Rhodes University, for providing me with this isiXhosa data.

[4] Manning et al. (2005:2) also note concerning Japanese morphological causatives (verb root + morphological causative) that speakers intuitively conceive them as single lexical words.

[5] It can be noted that different analysis has been proposed for the alternative marking of the causee argument and its consequence for the clause structure of the analytic causative in Korean. For a summary of such analysis and further discussions, see Seungju (2006).

[6] The theory of grammaticalization has made significant strides at showing the outcome of functional pressure on lexical items and constructions in many languages. For more discussion, see the following references Hopper (1991); Hopper and Traugott 2003; Heine and Reh 1982; Heine et al. 1991.

[7] Shibatani and Pardeshi (2002:96) identify 'sociative causation' as an "intermediate category between direct and indirect causation … bounded by direct causation on one end and indirect causation on the other." See also Pardeshi (1999) and Shibatani and Chung (2002).

[8] Studies on syntax of causatives usually focus on periphrastic causativization, that is, analytic/syntactic and or morphological (non-lexical) causatives.

[9] Compare, for example, Gerdts' (1990) and Lee's (1996) accounts on Korean causatives.

[10] Comrie (1976) indicates that the case hierarchy is not restricted to causative constructions but has validity in relative clauses across languages.

[11] For a discussion on the status of indirect objects in Akan, see Osam (1994a and 2000); also, Bresnan and Moshi (1990) for some Bantu languages.

[12] "Intrinsic force tendency" of entities is not necessarily commensurate with physical science. This is because all objects, unless set in motion, have a velocity of zero and therefore do not possess an "internal impulsion toward some state of activity but, rather, continue in their current velocity unless externally affected [therefore] stationariness is not a distinct state set apart from motion, but is simply zero velocity" (Talmy 2000:456). Thus, as Talmy (2000:456) notes, the conception of force quantities is expressed in language as naïve physics.

CHAPTER THREE

FORMAL TYPES OF CAUSATIVE EXPRESSIONS IN AKAN

1.0 INTRODUCTION

Causatives can be distinguished based on their morphosyntactic properties. Generally, three morphosyntactic types of causatives are distinguished namely, lexical, morphological and analytic/syntactic (Comrie 1989; Dixon 2000). Even so, the three causative types are sometimes collapsed into two: non-periphrastic/non-productive and periphrastic/productive causatives (see Shibatani 1976; Shibatani 2002; Song 2008).The distribution of these causative types across languages is said to be dependent, to a large extent, on the morphological properties a language displays (Shibatani 1976). In this chapter, we provide an overview of morphosyntactic types of causatives in Akan. Causatives in Akan may be classified into two main types, namely, non-periphrastic and periphrastic causatives. The examples used in this chapter are mainly from the Asante dialect; where other dialects are used these would be indicated as (Fa.) for Fante and (Ak.) for Akuapem.

2.0 NON-PERIPHRASTIC CAUSATIVES

2.1 Lexical Causatives

Lexical causatives involve the expression of causation by the use of a single lexical item. In a lexical causative the notion of cause and effect is conflated into one predicate and expressed as a single event. Table 3.1 provides some examples.

Table 3.1. ***Lexical causatives in Akan***

Lexical Causatives	**Gloss**
twá	'to cut'
bɔ́	'to break, hit'
bú	'to break'
hyé	'to burn'
kòà	'to bend'
tó/tów	'to throw'
té/súáń	'to tear'
sɛ̀ɛ́	'to destroy'
pĭà	'to push'
pàé	'to burst'
kúḿ	'to kill'

Consider the examples in (1-2) below.

(1)a. Kúkúó nó bɔ̀-ɔ̀è
pot DET break-COMPL
The pot broke.

b. Kofi bɔ̀-ɔ̀ kúkúó nò
Kofi break-COMPL pot DET
Kofi broke the pot.

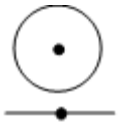
(2)a. Àtèré nó á-kóá
spoon DET PERF-bend
The spoon is bent.

b. Kwame kòá-à àtèré nó
Kwame bend-COMPL spoon DET
Kwame bent the spoon.

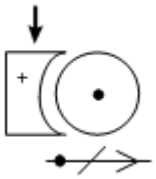
The sentences in (1a) and (2a) both express the state of an entity and present it as an autonomous event. In (1b) and (2b), however, an agent acts on another entity to bring about a change in the state of the entity. These states of affairs are represented in (Fig. 3.1).

Figure 3.1. ***Autonomous event vs. caused event*** **(based on Talmy 2000:418)**

a. *Autonomous events*; *no causality expressed*



b. *Non-autonomous events*; *causality expressed*



c. *Force-dynamics of lexical causatives*

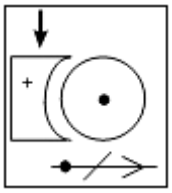


Fig (3.1a) represents a state of an entity over time where no causality is involved or expressed. Events such as (1a) and (2a) are therefore referred to as *autonomous events* because they do not involve causation or at least, they are not expressed as involving causation (see Talmy 2000:457). In (1b) and (2b), however, an agent (a causer) performs an action on another entity (a causee) which alters the original state of the causee. As illustrated in Fig (3.1b), the causer entity in the interaction is able to successfully alter the state of the causee because the causer is reckoned as possessing stronger force (indicated by the plus (+) sign). Notice also, that the action of the causer which overturns the state of the causee in (1b) and (2b) is sudden and this is represented by the downward pointing arrow (3.1b). Again, in a causative interaction there are two phases: (i) the original state of the causee before the exertion of force by the stronger causer, and (ii) the caused state of the causee (which is opposite the original state).

As we have observed, the lexical verbs in (1b) and (2b) (also in Table 3.1) encode, as part of their underlying semantics, causation. In other words, lexical causatives express firsthand the archetypical causative situation where a causer brings about a change in the state of a causee by exerting its relatively stronger force on the causee. Thus, as (3.1c) illustrates, lexical causatives conflate the action of the causer and the reaction of the causee in a single predicate and express the entire causative event as a single event.

2.1.1 Morphological Types of Lexical Causatives

Lexical causatives in Akan differ in the degree of morphological integration they display. Morphologically, these can be broadly grouped into two main classes: unanalyzable and analyzable lexical causatives.

2.1.1.1 Morphologically Unanalyzable Lexical Causatives

Unanalyzable lexical causatives are verbs which do not have internal morphological structure. These verbs occur as single morphemes which cannot be further broken down into smaller morphological components. Since Akan is not rich morphologically, the majority of lexical causatives are of the morphologically unanalyzable type. This class of verbs may consist of either monosyllabic or polysyllabic stems (see Table 3.2).

Table 3.2. ***Unanalyzable lexical causatives***

Monosyllabic	Gloss	Disyllabic	Gloss
bɔ́	'to break, hit'	*pàè*	'to split, burst'
bú	'to break'	*kúḿ*	'to kill'
hwé	'to beat'	*pìà*	'to push'
hyé	'to burn'	*hàtà*	'to dry'
ká	'to bite'	*wàè*	'to tear, break off'
pá	'to fade, ignite'	*pòtɔ̀*	'to mash'
sǐ	'to block, build'	*fìtì*	'to perforate'
té	'to tear'	*dèǹkyì*	'to capsize, hit',
tú	'to uproot, to dig'	*bùè*	'to open'
twá	'to cut'	*gyìnà*	'to stop'
yǐ	'to take, remove'	*dúḿ*	'to extinguish, put out fire

(3)a. Ɔ̀-pàé-è ègyá nó ɛ́nórà
3SGSUBJ-split-COMPL firewood DET yesterday
He split the firewood yesterday.

b. Kofi kùm̀-m̀ àpɔǹkyé nó
Kofi kill-COMPL goat DET
Kofi killed the goat.

(4)a. Pàpá nó hwè-è àkɔ̀làá nó
man DET beat-COMPL child DET
The man beat the child.

b. Yaw à-té àtààdéɛ́ nó
Yaw PERF-tear dress DET
Yaw has torn the dress.

The examples in (3a-b) involve lexical causatives which are polysyllabic unanalyzable verb stems while (4a-b) show monosyllabic unanalyzable verb stems. Thus, each of the lexical causative verbs in (3) and (4) consists of a single morpheme which cannot be further analyzed morphologically.

2.1.1.2 Morphologically Analyzable Lexical Causatives

Some lexical causatives in Akan, however, have clearly segmented morphology. Morphologically analyzable lexical causatives are verbs which are derived by reduplicating the verb stem leftward and, therefore, occur as polysyllabic stems. It must be noted, however, that while most verbs in the language can be reduplicated, in this section we are only concerned about verbs which express causation as stems or reduplicated forms. Table 3.3 presents pairs of verbs which are related morphologically through reduplication.

Table 3.3. ***Analyzable lexical causatives***

Root Verb	**Gloss**	**Reduplicated Form**	**Gloss**
bɔ́	'to break, hit'	*bɔ̀-bɔ̀*	'to break, hit'
hùnà	'to frighten'	*hùnà-hùnà*	'to frighten'
hyé	'to burn'	*hyè-hyè*	'to burn, feel hot'
ká	'to bite'	*kè-kà*	'to bite, itch'
pá	'to fade, slip'	*pè-pà*	'to fade, wipe, clean'
tú	'to uproot'	*tù-tù*	'to uproot, to feel a throbbing pain'
wɔ́	'to prick, stump, pound'	*wɔ̀-wɔ̀*	'to prick, stump, pound'
té	'to tear'	*tè-tè*	'to tear (into pieces)'
twá	'to cut'	*twì-twà*	'to cut (into pieces)'

Table 3.3 shows that analyzable lexical causatives involve verbs which have undergone reduplication and may complement a root verb in expressing causation. Consider the examples in (5a-d) below.

(5)a. Kofi bɔ̀-ɔ́ prétè nó
Kofi break-COMPL plate DET
Kofi broke the plate.

b. Yaw bò-bɔ́-ɔ́ m̀-prétè nó
Yaw RED-break-COMPL PL-plate DET
Yaw broke the plates.

c. Kwame tẁà-à dùá nó
Kwame cut-COMPL tree DET
Kwame cut the tree.

d. Kwadwo twi̇̀-twá-à dùá nó
Kwadwo RED-cut-COMPL tree DET
Kwadwo cut the tree (into pieces).

As shown in (5a-d), reduplicated verbs also express causation as do their verb stem. Notice, however, that the reduplicated verb may have additional semantics than the stem from which it is derived. For instance, the reduplicated verb *bɔ̀bɔ́* 'break' expresses additional meaning of repeated action which may involve several participants (both agent and theme) (5b). Likewise, while the reduplicated and the verb stem in (5c-d) both involve the idea of cutting something down, the reduplicated verb (5d) additionally involves cutting down an object several times into pieces. The same verb may also be employed when more than a single agent or theme is involve in the interaction. It must be noted, however, that in Akan, the relationship between stems and reduplicated verbs in expressing causation is anything but straightforward. We shall discuss more about reduplication and causation later in section 2.1.2 of this chapter. For now though, we survey the various verbal alternations involving lexical causatives in Akan.

2.1.2 Verbal Alternations of Lexical Causatives

Akan lexical causatives may involve different types of verbal alternation. The distinction made here is between pairs of verbs often referred to as inchoative/causative pairs where the inchoative member describes an autonomous (or non-causative) event but the causative counterpart expresses the same result as having been caused by an external agent.

(a) *Suppletives*

Suppletives are pairs of verbs which are etymologically unrelated but are used alternately to express causative and non-causative meanings (Comrie 1989). Thus, in suppletion, each of the verbs in the pair describes the same end-state of an entity but they differ in the expression of the causing event (Haspelmath 1993). Table 3.4 presents suppletives in Akan.

Table 3.4. ***Suppletives in Akan***

Non-Causative		Causative	
wú	'to die'	*kúḿ*	'to kill'
húnú	'to see'	*kyèrɛ́*	'to show'
sùà/nìḿ/tè[1]	'to learn, know, understand, hear'	*kyèrɛ́*	'to teach, to tell'

Consider the examples below.

(6)a. Àkókɔ́ nó wù-ùì
chicken DET die-COMPL
The chicken died.

b. Kofi kùm̀-m̀ àkókɔ́ nó
Kofi kill-COMPL chicken DET
Kofi killed the chicken.

c. *Kofi wù-ùì àkókɔ́ nó
Kofi die-COMPL chicken DET
Kofi killed the chicken.

(7)a. Frema hùnù-ù àtààdéɛ́ nó
Frema see-COMPL dress DET
Frema looked/saw the dress.

b. Yaw kyèré-è Frema àtààdéɛ́ nó
Yaw show-COMPL Frema dress DET
Yaw showed Frema the dress.

c. *Yaw hùnù-ù Frema àtààdéɛ́ nó
Yaw see-COMPL Frema dress DET
Yaw showed Frema the dress.

(8)a. Siaw tè[2]/nîḿ/sùá àkóntáá
Siaw understand/know/study mathematics
Siaw understands/knows/studies mathematics.

b. Tîkyà Kofi kyèré-è Siaw àkòntáá
Teacher Kofi teach-COMPL Siaw mathematics
Teacher Kofi taught Siaw mathematics.

c. *Tîkyà Kofi tè/nîḿ/sùá Siaw àkòntáá
Teacher Kofi understand/know/study Siaw mathematics
Teacher Kofi taught Siaw mathematics.

Examples (6a), (7a) and (8a) all express autonomous events, the state of entities as having occurred without an external causer agent. To derive causative meaning, however, in each case a different verb is employed. Thus, there is a division of labor between the verbs in the (a) sentences and those in (b); the former do not

express causation but the latter do. Thus, any attempt to introduce an agent in the (a) version results in ungrammaticality (6c), (7c) and (8c).

Suppletive pairs are interesting because they display lexical/constructional synonymy in language. However, it appears that suppletives are derived through a mapping of semantic domains of the different verbs such that only some semantic details for the mapping are maintained. For one thing, this mapping of semantic domains seems to be motivated by 'reverse view' image of the events described by the non-causative verb. Thus, even though suppletives express the same end-state, depending on where the speaker is viewing the event from, one of the verbs may be used. In effect, suppletives may not be necessarily synonyms in themselves. Hence, even though suppletives alternate in causative and non-causative meaning, we recognize that one may not be a paraphrase of the other. For instance, while (9b) may be paraphrased as (9a), (9a) does not imply (9b). Thus we can conclude that suppletive pairs may not be created as causative/non-causative pairs, per se, but rather are 'accidental pairs.'

(9)a. Kofi wù-ùì
Kofi die-COMPL
Kofi is dead.

b. Kwame kú-ù Kofi
Kwame kill-COMPL Kofi
Kwame killed Kofi.

(b) *Labiles*

Another group of inchoative/causative verb pairs involves labiles (Haspelmath 1993:93). Labile[3] refers to alternating verb pairs which express causative and non-causative meaning through zero (morphological) derivation. A number of Akan verbs display this alternation, especially change of state verbs and verbs of emission (see Osam 2008). Change of state verbs describe an altering in shape or state of an entity while verbs of emission express change of location (in state) of an entity (see Table 3.5).

Table 3.5. *Labiles in Akan*

Verb	Gloss	Verb	Gloss
bɔ́	'to make, create, break'	*kòà/kyèà/kòǹtònò*	'to bend'
bú	'to break, fell'	*Yèrà*	'to disappear, misplace'
bùè	'to open'	*sànè/sán*	'to untie, unravel'
búrú	'to ferment'	*Hwáń*	'to dislocate, twist (a joint)'
hyé	'to burn'	*Pìrìm̀*	'to be obstinate'
pàè	'to burst'	*Tùè*	'to pierce'
sɛ̀è	'to destroy, spoil'	*pɛ̀kyè/pètɛ̀w*	'to crush'
tàè	'to flatten'	*pèpà/pòpà*	'to clean' wipe'
té/súáń	'to tear'	*kyĭḿ*	'to turn, twist'
wàè	'to tear, split'	*wé*	'to dry'
wòsò/hímń	'to shake, tremble'	*bàè*	'to loosen'
sɔ̀nè/sɔ̀n	'to drain'	*hwìè/hùè*	'to pour'

(10)a. Bɔ́ɔ̀lò nó pàé-éɛ̀
ball DET burst-COMPL
The ball burst.

b. Kofi pàé-é bɔ́ɔ̀lò no
Kofi burst-COMPL ball DET
Kofi burst the ball.

(11)a. Ǹgó nó sɔ́n-èè (Fa.)
palm oil DET drain-COMPL
The palm oil drained (Osam 2008:53).

. b. Esi sɔ́ǹ-ǹ ǹgó nó (Fa.)
Esi drain-COMPL palm oil DET
Esi drained the palm oil (Osam 2008:53).

(12)a. Ǹsú nó húè-èì (Fa.)
water DET pour-COMPL
The water poured (Osam 2008:53).

b. Ekua húè-è ǹsú nó (Fa.)
Ekua pour-COMPL water DET
Ekua poured the water (Osam 2008:53).

It can be noted from each of the sentences in (10-12) that the same form of the verb may be used to express non-causative meaning in the (a) versions and causative meaning in the (b) versions. Sentences (10a-b) involve change of state verbs while (11-12) involve verbs of emission. Each of the verbs in the sentences above display two valency features, namely, intransitive and transitive argument structure. In the (a) versions, the only argument of the clause which occurs as subject is also a patient/theme whose state over time is described by the verb. In expressing the causative situation, however, the argument of the verb increase by one and the subject of the intransitive clause is realized as an object which undergoes the action described by the verb.

Haspelmath (1993) suggests a semantic motivation for the non-causative/causative alternation involving labiles. According to him,

> The most important specific semantic condition on inchoative/causative verb pairs is the absence of **agent-oriented meaning components**. The reason for this is clear: since the inchoative member implies the absence of an agent, it cannot contain agent-oriented semantic elements (Haspelmath 1993:93, emphasis in original).

Thus, Haspelmath (1993) proposes that only verbs which lack 'agent-oriented meaning' as part of their underlying semantic specification may participate in non-causative/causative alternation. Accordingly, verbs which contain agent-oriented meaning cannot have an inchoative counterpart since they would leave their agent position unspecified when they occur as inchoative. For instance, in (13), since the verb *twá* 'cut' contains agent-oriented semantics which must be expressed, as in (13a), leaving the agent of the action described by the verb unexpressed renders the sentence odd (13b). Thus, the verbs in (10-12) display causative/non-causative alternation because they do not require any agent as part of their internal semantics.

(13)a. Kwame twà-à dùá nó
Kwame cut-COMPL tree DET
Kwame cut the tree.

b. ??Dùá nó twà-àɛ
tree DET cut-COMPL
??The tree cut.

Haspelmath's (1993) proposal seems to suggest that labiles have an intransitive argument structure (without an agent specification element) as their basic structure and causative meaning is derived. However, to say that labiles have no specification for 'agent-oriented meaning component' as part of their underlying semantics is not uncontroversial. For example, Osam (2008:51) notes that in Akan "whether the intransitive use of these change of state verbs imply an agent or not would depend, in some measure, on the entity that undergoes the change in state." Daniel et al. (2005) also cast a shadow of doubt on Haspelmath's (1993) condition of the interplay of plus and minus values of 'agent-oriented meaning' in labiles by showing that in some languages like Agul (North-Caucasian), for instance, certain verbs which always denote agentive events in the real world such as *kill* and *to give birth* may participate in the inchoative/causative alternation (14a-b).

Agul (Daniel et al. 2005:20)

(14)a. Ze Hadad deʕü.ji-ʔ ***k'.i-f-e***
my grandfather(NOM) battle-IN die.PF-NMLZ-COP
My grandfather was killed during the war.

b. Ze Hadad deʕü.ji-n waXt.una ***k'.i-f-e***
my grandfather(NOM) battle-GEN time(ERG) die.PF-NMLZ-COP
My grandfather died during the war.

As shown in (14a-b), "in Agul, even an Agent-caused death may be described by an intransitive labile." Thus, Daniel et al. (2005) offer the following remarks:

> To explain this, we must admit that Haspelmath's claim that to be designated by a labile verb a change of state (or a going on) must be conceived as occurring spontaneously is neither necessary nor sufficient. The important thing is that the event of such

> spontaneous change of state must be conceived as basically the same event as its non-spontaneous correlate, and this is language specific. Both in birth and killing events Agents are present in the real world situation, but, in Agul, they may be absent from the frame of linguistic conceptualization (Daniel 2005:20).

Alternatively, Levin and Rappaport (1995:83) propose that "causative verbs do not arise from a process of causativization – they are inherently causative – but instead undergo a process of detransitivization under certain conditions." This means that for labiles the transitive (causative) verb constitutes the basic form while the intransitive (non-causative) use is derived. Levin and Rappaport (1995:85-86) argue that one way of determining the basic form of causative alternating verbs is by looking at the selectional restrictions on the range of objects/subjects which may occur in the transitive/intransitive use of the verb; the one with a wider range of subjects/objects is more likely to be the basic form.

Consider the selectional restrictions on the arguments which may occur in the causative/non-causative use of the verbs *break* and *open* in (15-16) taken from Levin and Rappaport (1995:85).

(15)a. Antonia broke the vase/the window

b. The vase/window *broke*

c. He *broke* his promise

d. *His promise *broke*

(16)a. Jean *opened* the door/window

b. The door/window *opened*

c. This book will *open* your mind

d. *Your mind will *open* from this book

In (15a-d) and (16a-d), we observe the relationship between the transitive (causative) and the non-transitive (non-causative) use of the verbs *break* and *open* respectively. As the examples show, the causative use of the verb allows for a wider range of subjects than the intransitive (non-causative) use.

A similar situation obtains in Akan, as shown in (17-18).

(17)a. Kwabena á-bɔ̀ tòá nó
Kwabena PERF-break bottle DET
Kwabena has broken the bottle.

b. Tòá nó á-bɔ̀
bottle DET PERF-break
The bottle has broken.

c. Asiedu bɔ̀-ɔ̀ Yaw àsóḿ
Asiedu hit-COMPL Yaw ears inside
Asiedu slapped Yaw.

d. *Yaw àsóḿ bɔ̀-ɔ̀è
Yaw ears inside hit
Yaw was slapped.

(18)a. Kwaku bù-ù àmáńgò dùá nó
Kwaku fell-COMPL mango tree DET
Kwaku felled down the mango tree.

b. Àmáńgò dùá nó bù-ùì
mango tree DET break-COMPL
The mango tree broke.

c. Ɔ̀kòrɔ̀m̀fóɔ́ nó bù-ù m̀màrá nó só
thief DET break-COMPL law DET top
The thief broke the law.

d. *M̀màrá nó só bù-ùì
law DET top break-COMPL
*The law broke.

We observe from the sentences in (17-18) that the range of arguments which may occur in the intransitive use of a causative/non-causative verb is limited as compared to that which may occur with the transitive use of the verb. In (17), we note that *bɔ́* 'hit' may be used causatively (17a) and non-causatively (17b). However, the type of arguments which may occur in the variant uses of the verb may not be identical. So while transitive (causative) *bɔ́* may take the object (Yaw's ear) (17c), this object cannot be the single argument of the intransitive use of the verb hence, the ungrammaticality of (17d). Likewise in (18) we observe that not all objects which occur with transitive *bú* may occur as subject of the intransitive use of the verb (compare (18c-d)). As these examples show, the set of arguments which the causative variant embraces is larger than the non-causative counterpart. It also seems to be the case that between the causative/non-causative uses of the verb, the causative use tends to take on more metaphorical or figurative meaning and thus occur with a wider range of arguments than the non-causative.

What accounts for the split (in)transitivity of causative/non-causative alternating verbs? According to Levin and Rappaport (1995:84), the non-causative counterpart is derived from an "operation that prevents the causer argument from

being projected to the lexical syntactic representation." A causative verb involves a dyadic event structure where an external causer acts (physically or otherwise) on an entity causing the latter to undergo a change of state. However, depending on different discourse-pragmatic factors sometimes only the caused state/events may be expressed with causative alternating verbs.

One prominent factor which may account for the use of causative/non-causative alternating verbs involves the factitive knowledge of the speaker about the event in question. As noted by Daniel et al. (2005:20), the expression of an event depends on the "frame of linguistic conceptualization" of the speaker about that specific event since every event involves "phase/factivity patterns" (Talmy 2000:436). Phase here refers to the "location along the temporal sequence at which focal attention is placed" while factivity involves "the occurrence or nonoccurrence of portions of the sequence and the speaker's knowledge about this" (Talmy 2000:436). These two factors are crucial in distinguishing between the expression of causation and autonomous events. In expressing causation, a speaker commits to knowledge of both causing and caused events as having actually occurred. That is, to say *Kofi broke the pot* the speaker is implying that he witnessed two events: (a) Kofi's hitting of the pot (perhaps with a stone) and (b) the pot breaking as a result of Kofi's action. Sometimes however, a speaker may be in a position to verify only a portion of the interaction such as the state of an entity over time. In such a situation, since only the final stage of the interaction is accessible to the speaker, that is what would be expressed.[4] So a speaker may choose to say *The pot broke* when he has no information regarding the causing phase of the process or

the causing state is simply not critical to the discourse. Thus, the alternation of a causative verb as non-causative may depend on speakers' knowledge of the various phases of the interaction or their commitment to expressing this knowledge for discourse-pragmatic reasons (see also Holmes 1999:324).

(c) *Causative Alternation*

Causative alternation refers to pairs of verbs which are etymologically related: the root verb is always non-causative while the derived verb is causative (Haspelmath 1993:91).[5] In Akan, causative alternation occurs through leftward reduplication of a root verb (which is non-causative) to derive a reduplicated verb which is causative. There are two verbs which appear to demonstrate this alternation in the language (Table 3.6).

Table 3.6. ***Causative alternating verbs in Akan***

Non-causative (Root Verb)		**Causative** (Reduplicated Verb)	
dá	'to sleep'	*dè-dà*	'to put to sleep'
tèè (*só*)	'to pant for breath'	*tèè-tèè*	'to disturb, worry'

(19)a. Konadu á-dá
Konadu PERF-sleep
Konadu is asleep.

b. Ǹnwóḿ nó dèdá-à Konadu
music DET put.to.sleep-COMPL Konadu
The music put Konadu to sleep.

c. *Ǹnwómḿ nó dá-à Konadu
music DET sleep-COMPL Konadu
The music put Konadu to sleep.

(20)a. Ama-à tèé só
Ama-PROG pant.for.breath top
Ama is panting for breath.

b. Kwamè-è tèètèè Yaw
Kwame-PROG disturb Yaw
Kwame is disturbing Yaw.

c. *Kwamè-è tèè Yaw
Kwame-PROG pant.for.breath Yaw
Kwame is worrying/disturbing Yaw.

As shown in (19a), *dá* 'sleep' is an intransitive verb which expresses a state of an entity and cannot be used to express a causative event, as shown by the ungrammaticality of (19c). In deriving the causative form of the verb, however, the root verb is reduplicated (19b). A similar observation is made regarding the verb *tèè só* 'to pant for breath'. In (20a), the verb is non-causative and to express causation it undergoes reduplication (20b). Accordingly, (20c) shows that only the reduplicated form of the verb may be used in expressing causation as the use of the root verb in this context is ungrammatical. Thus, reduplication may derive different verbs from root verbs and the pair may coexist in the language for distinct purposes. That is, in Akan, causative alternation results in the emergence of two etymologically related but morphosyntactically and semantically distinct verbs.

As already noted in section 2.1.1.2, most verbs in Akan may undergo reduplication. However, deriving lexical causatives through reduplication in Akan is rather irregular or unproductive. In fact, reduplication is not a causative derivation process in itself in Akan, contra Boadi (2005a).

For instance, it can be noted that the reduplicated verbs in Table 3.6 are not exclusively causative verbs. For that matter, the verbs may have different meanings and argument structure in different contexts. Compare the sentences in (21-22) below.

(21)a. Wɔ-dè-dá-à ɔhéné nó wɔ àhèǹfié
3PLSUBJ-RED-sleep-COMPL chief DET in palace
They laid the chief in state inside the palace.

b. M̀-mɔfrá nó á-dè-dà
PL-child DET PERF-RED-sleep
The children are asleep.

(22). Kofi-ĩ tèétèè
Kofi-PROG disturb
Kofi is disturbed.

As shown in (21a), the reduplicated verb *dè-dà* may be used to express the laying in state of a corpse for public viewing. However, in (21b), the reduplicated verb does not involve causation at all; rather, reduplication here reflects the multiple participants who are performing the action described by the verb. It can be noted too that in (21b), *dè-dà* occurs as an intransitive (non-causative) verb. Also in (22), the reduplicated verb *tèè-tèè* may occur as intransitive, describing a non-causative

situation. Thus, a verb may be reduplicated to reflect the multiple participants involved in the action or state described by the verb stem.[6]

Furthermore, verb reduplication may create different lexical items which are morphologically related but may have different semantics and/or argument structure. For instance, as illustrated in (23), the verb *hwɛ́* 'look' (23a) when reduplicated may take on the additional meaning 'to search' but the verb stem cannot be used in that context as shown by the ungrammaticality of (23c). By the same token, when *ká* 'bite' is reduplicated it takes on the extra meaning of 'to be itchy' (24b), a meaning which cannot be expressed using the verb stem (24c). Thus, reduplication may create pairs of verbs which may complement each other in expressing different notions.

(23)a. Yaw hwɛ̀-ɛ̀ àbábàá nó
Yaw look-COMPL young woman DET
Yaw looked at the young lady.

b. Yaw hwè-hwɛ́-ɛ̀ àbábàá nó
Yaw RED-look-COMPL young woman DET
Yaw searched for the young lady.

c. *Yaw hwɛ́-ɛ̀ àbábàá nó
Yaw look-COMPL young woman DET
Yaw searched for the young lady.

(24)a. Ɔ̀krámáń nó kà-à àbɔ̀frá nó
dog DET bite-COMPL child DET
The dog bit the child.

b. Ɔ̀krámáń nó hó kè-ká nó
dog DET skin RED-bite DET
The dog is feeling itchy (lit. the dog's skin is biting him).

c. *Ɔ̀krámáń nó hó ká nó
dog DET skin bite DET
The dog is feeling itchy.

That reduplication is not a causative derivation process in Akan can also be seen in the fact that transitive verbs which express causation may be reduplicated. In such situations, the reduplicated verb does not involve additional or more causation but may indicate iterativity or repetition of the action described by the verb, as shown in (25-26).

(25)a. Kofi pàé-è bɔ́ɔ̀lò nó
Kofi burst-COMPL ball DET
Kofi burst the ball.

b. Kofi pàé-pàè-è bɔ́ɔ̀lò nó
Kofi RED-burst-COMPL ball DET
Kofi burst the ball.

(26)a. Ɔ̀krámáń nó kà-à àkɔ̀làá nó
dog DET bite-COMPL child DET
The dog bit the child.

b. Ɔ̀krámáń nó kè-kà-à àkɔ̀làá nó bàsàbàsà
dog DET RED-bite-COMPL child DET haphazardly
The dog bit the child haphazardly.

c. ??Ɔ̀krámáń nó kà-à àkɔ̀làá nó bàsàbàsà
dog DET bite-COMPL child DET haphazardly
The dog bit the child haphazardly.

The sentences in (25a-b) show that a lexical causative when reduplicated does not involve double causation but rather shows that the action of the agent is iterative or repetitive. Thus, (25b) may be used in a context where the agent, Kofi, may have

driven a sharp object through the ball several times causing the ball to burst. Likewise, when the verb *ká* 'bite' is reduplicated (26b) it expresses an action being carried out repetitively. In addition, when the adverb *haphazardly*, which involves an erratic or random action, is introduced in the sentence the use of the reduplicated verb (26b) is more felicitous than the verb stem (26c) showing that the reduplicated verb involves the additional semantics of iterativity or repetitive action.[7]

It can be noted, however, that reduplication of verbs in Akan does not always results in a change of meaning and the pair may be used in identical contexts. For example, as shown in (27), both the verb stem and its reduplicated counterpart have the same meaning and, therefore, one may be used in place of the other. Interestingly, however, synchronically, the reduplicated form is more preferred and used in many contexts than the root form. In fact, the availability of the root verb *hùnà* in (27a) may be attributed to the fact that it is frozen as part of a proverbial expression in the language.

(27)a. Wɔ-m̀-fá àdè kɔ́kɔ̀ɔ́ ǹ-hùná ɔ̀bàyĭfòɔ́
1PL-NEG-take thing red NEG-frighten witch
We do not frighten a witch with a red object (Boadi 2005:314).

b. Wɔ-m̀-fá m̀feḿféḿ ǹ-hùná-hùnà àbɔ̀dwèsɛ́ nàná
1PL-NEG-take moustache NEG-RED-frighten beard grandparent
We do not frighten a full bearded man with moustache (Boadi 2005:314).

The discussion so far has shown that reduplication of verbs may result in creating different verbs, marking of multiple participants or to show that the action described by the verb is repetitive or iterative. Reduplication, however, does not create exclusive causative verbs but causative meaning may be part of the underlying semantics of the reduplicated form.

2.2 Cause-Effect Serialization

One prominent feature of Akan morphosyntax is verb serialization– the concatenation of two or more verbs to express what is conceptualized as a unitary event (Christaller 1875; Lord 1973; Essilfie 1984; Osam 1994a and 2004; Agyemang 2002). Causation is often expressed in serial verb constructions (SVCs) in Akan. Essilfie (1984:60) offers the following explanation for the use of serialization in expressing causation:

> I believe that the interpretation of serial sequences of verbs in Fante causative sentences … requires an understanding of causation as a series of events in which the occurrence of one event has the occurrence of another event as its consequence (Essilfie 1984:60).

Thus, in cause-effect serialization the verb series individually code separate micro-events of the causative situation. For example, the sentences in (28a-b) both express causation through two verbs: the initial verb describes the causing event while the non-initial verb expresses the caused event component.

(28)a. Kofi pìá-à Ama hwè-è fáḿ
Kofi push-COMPL Ama fall ground
Kofi pushed Ama down.

b. Kofi bɔ̀-ɔ̀ àbóá nó kùm̀ nò
Kofi hit-COMPL animal DET kill 3SGOBJ
Kofi hit the animal and killed it.

It can be observed from the examples in (28a-b) that the ordering of the verb series in serialized causatives reflects the conceptual sequence of causation (Durie 1997:330-331). In this iconic pattern, the initial verb expresses the initial action, a causing event, while the non-initial verb conveys the resulting event. Thus, in (28a), to express causation the verb *pìà* 'push' precedes *hwé* 'fall'. Likewise, in (28b), the sequence of events is reflected in the iconic ordering of the verbs such that *bɔ́* 'hit' occurs before *kúḿ* 'kill'.

It must be noted, however, that even though in cause-effect serialization there are two (or more) predicates the series of verbs in this construction is thought to act like a single predicate which expresses a single event. Accordingly, the verb complex in a cause-effect serialization takes one tense/aspect/mood specification and share a common argument, typically one grammatical subject. In chapter four, it will be shown that cause-effect serialization, like many kinds of serialization in Akan, display syntactic properties akin to simple sentences (with a single verb). Consequently, cause-effect serialization is appropriately categorized as a type of non-periphrastic causative in Akan.

3.0 PERIPHRASTIC CAUSATIVES

3.1 Analytic Causatives

Analytic causatives involve the expression of causation with two (or more) verbs, one for cause and the other for effect (Comrie 1989; Dixon 2000). The prototypical analytic causative in Akan involves the use of the causative verb *má* and a verb of effect.

(29)a. Kwame mà-à Adwoa sù-ì
Kwame CAUS-COMPL Adwoa cry-COMPL
Kwame made Adwoa cry.

b. Yaw á-m̀-má Adwoa
Yaw PERF-NEG-CAUS-COMPL Adwoa
á-ǹ-tò ǹnwóḿ nó bɪ̀
PERF-NEG-sing song DET some
Yaw did not make/let Adwoa sing (any part of) the song.

As can be observed in (29a-b), in the analytic causative construction the causing event is expressed through the causative verb *má* which occurs as the initial verb while the caused event is coded by the non-initial verb. Also, both the causative verb and the verb of effect inflect for the same tense/aspect/mood categories.

There is another kind of construction involving *má* which may be used to express causative meaning. In this construction, *má* occurs together with another verb as a non-initial verb in expressing causation. Yoon (2007:23) refers to sentences of this type as *quasi-causative constructions* (quasi-CCs).

Consider the following sentences in (30-31).

(30)a. Kofi yɛ́ mà-à Adwoa dwàné-èɛ̀
Kofi do CAUS-COMPL Adwoa run-COMPL
Kofi caused it that Adwoa run away.

b. Ato yɛ́-ɛ̀ mà Araba kɔ́-ɔ̀ fíé (Fa.)
Ato do-COMPL COMP Araba go-COMPL home
Ato caused Araba go home.

(31)a. Yaw hwɛ́ mà-à Akosua sɪ̌-ɪ̀ ǹnéémá nó
Yaw look CAUS-COMPL Akosua wash-COMPL things DET
Yaw made Akosua wash the clothes (lit. Yaw saw to it that Akosua washed the clothes).

b. Esi hwɛ́-ɛ̀ mà Ekow dzɪ̀dzɪ̂-ɪ̀ (Fa.)
Esi look COMP Ekow eat-COMPL
Esi made Ekow eat (lit. Esi saw to it that Ekow ate).

In (30a-b), the verb *yɛ́* 'do, make' is used with *má* to express causation. In this construction, a causer initiates an action or set of actions (direct or indirect) which purpose is to influence the causee to perform a specific action. Similarly, when *hwɛ́* 'look' occurs with *má* (31a-b) it conveys the idea of a causer who acts to ensure that the causee performs a particular action. Asante and Fante, however, display a difference in the marking of the Completive aspect. In Asante (30a) and (31a), the Completive aspect is marked on the non-initial verb *má* while in Fante it is marked on the initial verb but not on *má* (30b) and (31b). Thus, while in Asante *má* occurs as a verb in Fante it behaves as a complementizer. In effect, quasi-CCs are manifestations of *má* manipulative complementation and can be distinguished syntactically (and semantically) from the analytic causative construction.[8] In this

study, we shall limit the discussion to the analytic causative construction where *má* occurs as the initial verb.

We must distinguish analytic causatives from serialized causatives because even though they appear to be similar on the surface they are, in reality, different. Analytic causatives are both semantically and syntactically different from serialized causatives. Consider the difference in meaning between the sentences in (32) and (33).

(32). Kofi mà-à Ama hwè-è fáḿ
Kofi CAUS-COMPL Ama fall-COMPL down
Kofi caused/let Ama fall down.

(33). Kofi súḿ-ḿ Ama hwè-è fáḿ
Kofi push-COMPL Ama fall-COMPL down
Kofi pushed Ama and she fell down.

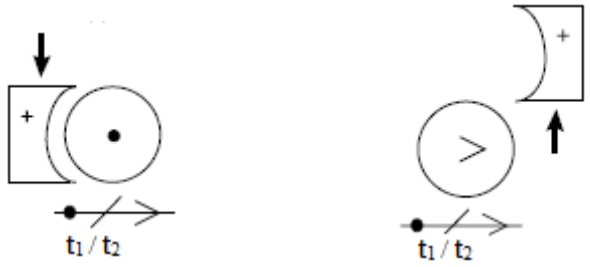
The sentences in (32) and (33) differ with regard to the expression of the causing event. One major property of analytic causatives is that they do not explicitly express the causing event but rather express just the abstract notion of causation (Song 2008; Dixon 2000). Thus, while in cause-effect serialization (33) the causing event is explicitly stated as involving an act of *pushing*, no specific action is expressed in (32) as constituting the causing event. Accordingly, Essilfie (1984:56) states that analytic "causative sentences in Akan are neutral to the type of instigation implied." Thus, unlike serialized (and lexical) causatives, analytic causatives may express an 'open' causative relation and, therefore, a single

causative morpheme may be used to express several notions of causation. In chapter five, I present the major event types of causation which may be expressed in the analytic causative construction.

As noted in example (32), analytic causatives convey a dyadic event where a stronger causer (ANT) impinges on a causee (AGO) which results in the latter entity undergoing a change in action or state (Fig 3.2a). But that is not all. Analytic causatives may also be used to express the notion of *letting*, where a stronger causer who restrains a causee from displaying its original state or action for a time ceases from acting on the causee, resulting in the causee eventually able to display its state or action (Fig 3.2b). Thus, analytic causatives may present ambiguity as to whether the causing event involves application of force on the causee (*causing*, Fig 3.2a) or removal of force from the causee (*letting*, Fig 3.2b). In chapter five, I will attempt an explanation of why both *causing* and *letting* may be expressed through the same causative predicate.

Figure 3.2. ***Basic force-dynamic patterns of analytic causatives*** **(Talmy 2000:418).**

a. *causing* b. *letting*



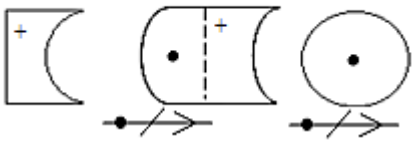
Analytic causatives are interesting in another respect especially with regard to the role of the causee entity in the causative interaction. As already noted, in this construction, the causer brings about a change in the causee's state of being. However, this characterization, it seems, represents only one pattern of analytic causativization. In many cases, the action of the causer on the causee does not merely result in a change of state of the latter, but it sets in motion another causative event which is carried out, not by the causer, but by the causee. Consider the example in (34).

(34). Àpòlísìfóɔ́ nó mà-à à-kòrɔ̀m̀fóɔ́ nó kùm̀-m̀ pàpá nó
police DET CAUS-COMPL PL-thief DET kill-COMPL man DET
(i) The police caused it that the thieves killed the man (by not negotiating well in a hostage crisis).
(ii) The police allowed the thieves to kill the man (by not the handcuffs on the thieves).

As shown in (34), the causee performs an additional role as a result of being 'affected' or 'released' by the causer. In this sentence, there is a chain of two causative events which is initiated by a 'primary' causer, the police, who through either application of force or removal of restraint on the thieves enables the latter to act in a manner which affects another entity. Thus, the causee here is both patient and agent; on one hand, it undergoes the action described by the causative predicate and on the other hand subsequently initiates an action itself. This dual role of the causee is represented in Fig 3.3. In this diagram, it can be noticed that a causer overcomes a causee, moving it towards an action. However, the causee does not simply undergo a change of state but it initiates a force quantity of its

own and acts on another entity, a secondary causee, to cause it to perform a particular action. In Fig 3.3, the broken line in the AGO is employed as a shorthand for the different *phases* of the AGO as a 'primary' AGO and a 'secondary' ANT of the interaction.[9]

Figure 3.3. ***Force-dynamics of analytic causatives***
(based on Talmy 2000)



As shown in (34) above, analytic causatives which involve 'primary' and 'secondary' ANT/AGO are realized in causatives which are based on transitive (lexical) causatives. As we shall discuss in chapter five, the dual role of the AGO as primary causee and secondary causer fits neatly into some semantic configurations of the causative. In fact, different languages have various ways of coding the causee argument usually reflecting its role in the construction. Thus, quite often the grammatical coding of the causee may be regulated by its semantic properties/functions in the construction. However, in Akan, the causee can occur as an object or subject, although there does not appear to be any semantic difference between the two constructions. I investigate this asymmetry in detail in chapter four.

We can conclude this section by saying that the analytic causative morpheme has as its primary function the identification of an entity in the clause as responsible for the event described by the non-initial predicate(s). It points to an individual in the sentence (the primary ANT) as causing a change in the state of affairs of another entity through the impact of greater force or removal of such force. It was also observed that the analytic causative construction expresses an 'open' causative meaning and, as such, may convey different force-dynamic notions. Thus, it appears that the primary semantic function of the causative morpheme *má* is to assign BLAME to an entity in the construction. To understand this function of *má* better, it is important to trace the development of this morpheme into a causative verb in the Akan language.

3.1.1 Grammaticalization of *má* 'give'

In many languages the analytic causative morpheme may be related to the verb 'give' either synchronically or diachronically (see Table 3.7).

Table 3.7. ***Grammaticalization of GIVE into a causative marker***

Language	Causative morpheme		
Ewe (Kwa, Niger-Congo)	*na*	'to give'	Larnyo (2013)
Ga/Dangme (Kwa, Niger-Congo)	*ha*	'to give'	Dakubu (2002)
Mandarin Chinese (Sinitic, Sino-Tibetan)	*gěi*	'to give'	Newman (1997:174)
Thai (Thai Kadai)	hây	'to give'	Rangkupan (2007:194)
Nahuatl (Uto-Aztecan)	-tia	'to give'	Tuggy (1998)

In Akan, the causative verb *má* can be shown to be a grammaticalization of the verb *má* 'give'.[10] This three-place predicate functions as a very productive verb, which expresses a wide variety of meanings and concepts such as benefactive and resultative events (Lord et al. 2002). Evidence from the language also shows the grammaticalization of *má* into a complementizer (see Osam 1994a, 1998 and 2007; Lord et al. 2002).

In Akan, *má* 'give' can be used to express literal GIVE which carry a benefactive meaning. In this use, *má* occurs as a ditransitive verb and carries three noun arguments ([NP_1 *má* NP_2 NP_3]).

(35)a. Ɔ̀-mà-à nò àdùàné
3SGSUBJ-give-COMPL 3SGOBJ food
He gave him food.

b. Kofi mà-à Ama àtàádéɛ́
Kofi give-COMPL Ama dress
Kofi gave Ama a dress.

As shown in (35a-b), in the ditransitive GIVE construction *má* takes three noun arguments namely, a Giver (subject), the Thing (object) given and a Recipient (object). The Giver (NP_1) is an animate/volitional entity from whom the transfer originates. It can be observed that benefactive meaning of a transfer of an object is derived basically from the perspective of either the Giver or Recipient. In other words, benefactive sentences suggest that either the Giver perceives that the Thing given would be advantageous to the Recipient or the Recipient (beneficiary)

accepts the Thing transferred to him/her as a beneficial item or both instances hold true. The absence of one of the conditions, however, may not affect the benefactive meaning of the construction in any serious way because any of the participants can claim such meaning. Sentences of this type, therefore, instantiate the prototypical notion of *give*. It is argued that the analytic causative construction in Akan is modeled after this specific GIVE-schema, where a Giver enables (or causes) a Recipient to receive or have in possession an object. [11]

An extension of literal GIVE involves the use of a serial verb construction in which *má* occurs as a non-initial verb ([NP_1 V NP_2 *ma* NP_3]). Osam (1994a:179) explains that "in the serialization, the first verb will indicate whatever action was carried out and the second verb [*má*] will introduce the Benefactive entity." This is illustrated in (36a-b).

(36)a. Ɔ̀-dè ǹwómá nó mà-à nò
3SGSUBJ-take book DET give-COMPL 3SGOBJ
He gave the book to him (lit. he took the book and gave it to him)

b. Kofi kɔ̀-ɔ̀ ǹsúó mà-à né màámé
Kofi go-COMPL water give-COMPL his mother
Kofi fetched water for his mother.

c. Ɔ̀-bɔ̀-ɔ̀ m̀páéɛ́ mà-à mé
3SG-say-COMPL prayer give-COMPL me
S/he prayed for me.

In each of the sentences in (36a-c), *mɑ́* occurs as a non-initial verb which introduces the Beneficiary or Recipient of the action performed by the Giver (subject). Thus, in (36a-c), *mɑ́* links the Giver's action to the Recipient and identifies the Recipient as the target of the Giver's action. Hence, sentences of this type may be referred to as *core benefactive constructions*.

It is proposed that the literal GIVE-construction and its extension, the core benefactive construction, serve as source domains for the grammaticalization of *mɑ́* into other functions in the language. For instance, it is possible to trace the development of *mɑ́* 'give' into a causative verb from the GIVE construction. Osam (1994a:264) notes that at this stage, this verb was used in two-verb serialization where it occurred as an initial verb of the construction (37).

(37)a. Kofi mà-à Ama hwè-è àsè
Kofi give-COMPL Ama fall-COMPL down
Kofi made/caused Ama to fall down.

b. Akua frɛ̀-ɛ̀ Yaa bà-ɛ̀ɛ̀
Akua call-COMPL Yaa come-COMPL
Akua called Yaa and she came.

c. Adowaa tò-ò ɛ̀bɔ́ɔ́ nó twènέ-ɛ̀ɛ̀
Adowaa throw-COMPL stone DET displace-COMPL
Adowaa threw away the stone.

The sentences in (37a-c) show that in a two verb serialization, the action of the agent affects the state of the object. In (37a), *mɑ́* is used to express a (causative) action on the part of an agent on a patient which results in the latter falling down.

The same situation obtains in (37b) where an agent performs an action (calling) and a patient responds by initiating movement. Similarly, in (37c), the agent takes hold of an object and throws it away and the object, given its nature, undergoes a change of state proportionate to the amount of force exerted by the agent.

Literal GIVE may be grammaticalized to express causative meaning, as illustrated in Fig 3.4 below.

Figure 3.4 ***Extension of GIVE to causative sense*** **(Newman 1996:179)**

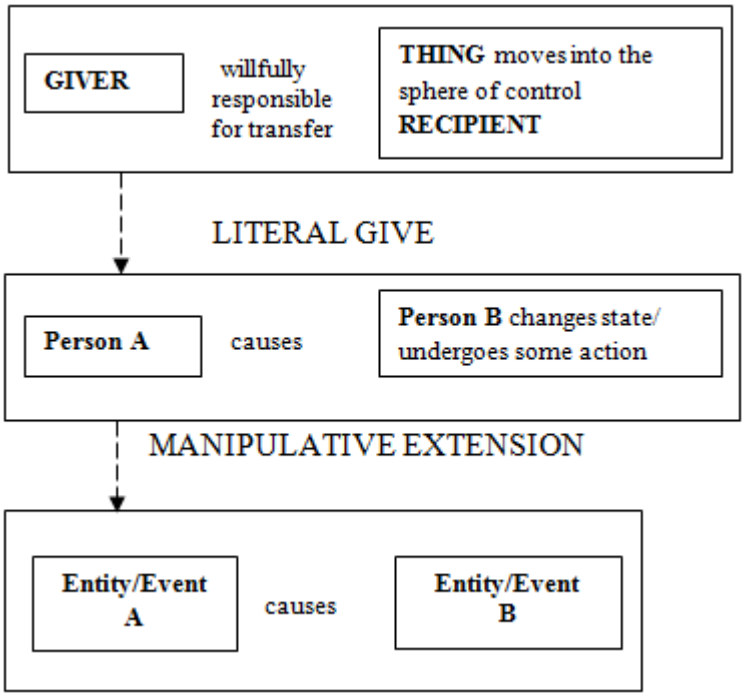


Fig 3.4 shows that literal GIVE is consistent with causation and, therefore, a GIVE verb may be extended to express causation. There are some similarities and differences between literal GIVE and its causative extension. For one thing, literal GIVE does not specify a particular act of giving, per se, but denotes a general

transfer of an object from an Agent to a Recipient. Thus, the transfer may be literal or non-literal (38).

(38)a. Kwame mà-à Yaa àtàádéé́
Kwame give-COMPL Yaa cloth
Kwame gave Yaa a dress.

b. Mé pàpá mà-à mè àsàásé
my father give-COMPL 1SG land
My father gave me (a piece of) land.

Thus, while it is possible to conceive that in (38a) there is a literal movement of the dress from Kwame to Yaa, such literal transfer cannot be assumed for (38b). In fact, even in (38a), the verb does not specify whether the giver physically handed over the dress to the recipient or perhaps the giver bequeathed the dress in writing to the recipient. In effect, literal GIVE does not specify any particular act of giving but rather expresses a transfer of possession. Similarly, in the causative, *má* does not specify any particular causing event but expresses the abstract notion of causation. Accordingly, analytic causatives may be ambiguous as to the type of instigation involved, yielding different event patterns of causation. Hence, just as in literal GIVE *má* identifies an agent as responsible for the transfer and change of state of the recipient, in the causative, *má* identifies an entity, a causer, as ultimately responsible for the change of state or action of another entity, a causee. Thus, the notion of BLAME assigned to an agent in literal GIVE is also transferred to the analytic causative construction. Consequently, *má* iconically occurs immediately after the agent (causer) in the causative sentence.[12]

One consequence of the analysis of the causative verb *má* as having developed from the lexical verb *má* 'give' through grammaticalization is that it discounts the two verbs as homophonous in the strictest sense of the word. This is because an upshot of grammaticalization may be the creation of morphologically related forms which may diverge in their functions (see Hopper 1991:24). Thus, *má* diverges functionally between its use as a lexical verb (in literal GIVE) and as a causative verb (in analytic causative construction). In other words, *má* when used in the causative construction does not have a specific lexical meaning but may express any notion of causation. Hence, in this study, the causative verb is given the interlinear glossing CAUS to show that the morpheme does not express a specific action but expresses the abstract notion of causation.

A further grammaticalization of *má* is its development into a resultative marker. The form *má* can link two overtly stated events as causatively related. In this function, *má* occurs as a non-initial verb in a "three verb serialization" (Osam 1994a:264). Consider the following sentences.

(39)a. Ɔdehyeansu pɛ̀m̀ Monkyi **mà**-à
Ɔdehyeansu hit Monkyi **RESUL**-COMPL
ɔ̀-nyàné-éɛ̀
3SGOBJ-wake.up-COMPL
Ɔdehyeansu hit Monkyi so that he woke up (Boahene 1997:21)

b. Ɔ̀-bɔ̀-ɔ́ nó **mà**-à
3SGSUBJ-strike-COMPL 3SGOBJ **RESUL**-COMPL
no hwè-è àsè
3SGOBJ fall-COMPL down
He struck him so that he fell.

Examples (39a-c) show that in the resultative construction *má* occurs as a non-initial verb which introduces an event B (resulting event) by linking it with a previous event A (causing event).[13] The resultative, however, differs from analytic causatives in that in the former, the causing event is overtly expressed but it is gapped in the latter.

In its function as a resultative marker, *má* displays a farther development on the cline of grammaticalization. Osam (2007) shows that, at least in Fante (and Akuapem), *má* occurs as a complementizer in the resultative construction (40a-b). In this function, the erstwhile verb does not inflect for tense/aspect/mood categories in the language.

(40)a. Akosua hyé-è Kofi **mà** ɔ-yé-è (Fa.)
Akosua force-COMPL Kofi **COMP** 3SG.SUBJ-do-COMPL
àdwúmá nó
work DEF
Akosua forced Kofi to do the work (Osam 2007:112).

b. Akosua à-ǹ-hyɛ́ Kofi **mà**
Akosua COMPL-NEG-force Kofi **COMP**
ɔ-á-ǹ-yɛ́ àdwúmá nó
3SG.SUBJ-COMPL-NEG-do work DEF
Akosua did not force Kofi to do the work (Osam 2007:112-113).

Thus, *má* as a resultative marker displays different properties in different dialects of Akan. In Asante (39a-b), it inflects for tense/aspect but in Fante (and Akuapem) (40a-b) it behaves as a complementizer and does not take verbal trappings. Notice too, that in the Asante sentences (39a-b), the resumptive pronoun may occur either

in the subject (39a) or object (39b) form with no discernible difference in meaning. In Fante, however, the resumptive pronoun can only occur in the subject form.[14] This situation is also encountered in the causative where in Asante the causee argument may be coded either as subject (41a) or object (41b) but in Fante it can only occur as subject (42a) hence, the ungrammaticality of (42b).[15]

(41)a. Ɔ̀-mà-à **ɔ́**-kɔ̀-ɔ̀ fíé
3SGSUBJ-CAUS-COMPL **3SGSUBJ**-go-COMPL house
He made him go home.

b. Ɔ̀-mà-à **nó** kɔ̀-ɔ̀ fíé
3SGSUBJ-CAUS-COMPL **3SGOBJ** go-COMPL house
He made him go home.

(42)a. Ɔ̀-má-à **ò**-dzí-ì èdzìbán no (Fa.)
3SGSUBJ-CAUS-COMPL **3SGSUBJ**-eat-COMPL food DET
He made him eat the food.

b. *Ɔ̀-má-à **nó** dzí-ì èdzìbán nó (Fa.)
3SGSUBJ-CAUS-COMPL **3SGOBJ** eat-COMPL food DET
He made him eat the food.

In chapter four, we will discuss into more detail the syntactic properties of the alternating constructions and show how they can be properly categorized. In so doing, I will point to the different stages of development of *má* in the dialects of Akan as responsible for the alternation in the marking of the causee argument in the language.

4.0 CHAPTER SUMMARY

This chapter has presented the formal types of causative expressions identifiable in Akan. The study identified two main types, non-periphrastic (lexical and cause-effect serialization) and periphrastic (analytic) causatives. Lexical causatives involve the use of lexical items (verbs) to express causation. Akan lexical causatives may be divided into two types based on their morphological structure. Most lexical causatives are roots which have no analyzable morphological structure. Such lexical causatives were referred to as Unanalyzable Lexical Causatives. Analyzable Lexical Causatives, on the other hand, are causative verbs which involve reduplicated verb stems. These morphologically analyzable forms express additional meaning from their root verbs and occur in complementary distribution in expressing causation with the stems from which they are derived. Again, evidence was adduced to the effect that analyzable causatives may derive different verbs in the language which may be listed and learned independently. Thus, Akan lexical causatives exhibit a continuum of morphological integration.

This chapter also presented an account on analytic causatives in Akan. The analytic causative morpheme *má* 'make, cause' employed in the language developed from the verb *má* 'give' which has quite a number of functions such as expressing benefactive and resultative events. Again, this morpheme has grammaticalized into a complementizer in some dialects of Akan and its diffusion across the dialects has consequence for the syntax of constructions in which this form occurs such as the causative.

ENDNOTES

[1] Suppletion of *té* 'hear' and *kyèré* 'tell' seems to be especially used in the Kwahu dialect of Akan. In this dialect, it is possible to hear such utterances as below:

(1). Ama tè-è yèn ǹtɔ́kwá nó … Kofi nà ɔ-kyéré-è nó
Ama hear-COMPL 3PL quarrel DET Kofi FOC 3SGSUBJ-tell-COMPL 3SGOBJ
Ama heard (about) our quarrel… it is Kofi who told her.

In this example, Ama's knowledge of the event (that is, the quarrel), may be attributed to Kofi who divulged such information to her.

[2] The use of *té* 'to know, understand' is particularly used by younger speakers.

[3] According to Haspelmath (1993:108, ft. 7), "the term *labile* was borrowed from Caucasian linguistics, where it is in general use." See also Kulikov (2001).

[4] Of course, not every event involving an entity may be caused by an external agent. But the non-causative use of a causative/non-causative verb expresses an event as occurring spontaneously without an agent. As Haspelmath (1993:90) notes, however, "this does not mean that there cannot be an agent in the objective situation."

[5] There are, however, languages in which the reverse is found, e.g. languages of the South American Cariban family (see Payne and Payne 2013).

[6] See Osam et al. (2011:110-111) for a discussion on the use of reduplication in marking plurality in relator nouns in Akan. Ofori (2006:46-112) also presents a morpho-phonological analysis of reduplication in Akan.

[7] Other physical process verbs which when reduplicated express repetitive or iterative action include the following:

(2).

bú	'to break'	*bù-bù*	'to break repeatedly into pieces'
twá	'to cut'	*twì-twà*	'to cut repeatedly into pieces'
twé	'to pull'	*twè-twè*	'to pull several times'
tó	'to throw'	*tò-tò*	'to throw repeatedly'
bɔ́	'to break'	*bò-bɔ̀*	'to break repeatedly into pieces'
té	'to tear'	*tè-tè*	'to tear into pieces'

[8] Complement constructions in Akan have been thoroughly discussed in the literature. See, for example, Osam (1994a:240) and (1998), Boadi (2005b) for the relevant discussion.

[9] For a similar analysis, see Gilquin (2010:61-63) on English periphrastic causatives.

[10] The grammaticalization of *má* 'give' into a causative verb has not been unanimously accepted by linguists working on the language. For instance, Essilfie (1984:56) states that "it is debatable whether the stem [*má*] represents two homophonous verbs or indeed it is the same whose different syntactic uses impose the two interpretations." I do not suppose this debate to be trivial and, therefore, suggests that this murky status of *má* can be resolved by adopting the framework of grammaticalization in accounting for the development of this verb. This approach would help us to avoid the pitfall of categorizing words into discreet classes with no recourse to their lexico-grammatical distribution and function(s) in language. The grammaticalization framework used in this study is from Hopper and Traugott (2003).

[11] For a more detailed discussion on the use of *má* as a ditransitive verb, see Osam (1994a:169) and (1997).

[12] It can be noted, however, that not all features of literal GIVE are extended to causative expressions. For instance, while GIVE involves volitional Agents, that is, animate entities, analytic causatives are compatible with both animate and non-animate agents (causers). Thus, in (3), an inanimate (incapable of volition) causer, the sun, acts on an inanimate causee, a river, to cause it to dry up.

(3). Àwìá nó mà-à ǹsúó nó wè-èɛ́
sun DET CAUS-COMPL river DET dry-COMPL
The sun caused the river to dry up (Agyekum 2006:219).

Examples such as (3) demonstrate that as a term grammaticalizes it may lose some of its syntactic and/or semantic restrictions and properties because it generalizes in meaning to accommodate more senses or meanings (Heine et al. 1991). As Lord et al. (2002:233) note, "in certain contexts one facet of the morpheme's meaning may be more salient, more congruent with particulars of the situation [but] in other contexts, that facet may be less relevant, more peripheral." Thus, even though it can be shown that the causative morpheme is a grammaticalization of the literal GIVE, we do not expect these two forms to have identical syntactic structure and/or semantic restrictions.

[13] Also, in the resultative construction, *má* may identify an initial event A as carried out for the purpose of realizing another event B in what has been referred to as a purposive/consequence construction (see Lord et al. 2002:227).

[14] The alternation in the form of the resumptive pronoun in resutlative constructions cannot be extended to include other biclausal sentences. For example, in (3a) the resumptive pronoun can only be in the subject form regardless of the dialect as a change from subject to object form results in an ungrammatical sentence (3b).

(3)a. Kofi hyè-è Ama sɛ́ **ɔ**-ń-kɔ́ fié
Kofi order-COMPL Ama that **3SGSUBJ**-OPT-go home
Kofi ordered Ama that she should go home.

b. *Kofi hyè-è Ama sɛ́ **no** ń-kɔ́ fié
Kofi order-COMPL Ama that **3SGOBJ** OPT-go home
Kofi ordered Ama that she should go home.

[15] In Asante, an object marked causee is preferred.

CHAPTER FOUR

SYNTAX OF CAUSATIVES IN AKAN

1.0 INTRODUCTION

This chapter examines the syntax of causatives expressions in Akan. In section 2, I discuss the various syntactic properties of non-periphrastic (lexical and cause-effect serialization) and show that this type of causative expression involves a monoclausal structure. In section 3, I examine the syntactic properties of periphrastic causatives (analytic causatives) to ascertain their clausal structure. Much attention is given to analytic causatives especially with regard to the differences in the coding of the causee argument. It is proposed that the different coding of the causee argument signals different syntactic properties of the causatives. Section 4 provides an analysis of the status of arguments especially, the causee and affectee NPs, in the causative by applying some specific tests such as word order, relativization and focus extraction. The chapter concludes with a summary of the discussion in section 5.

2.0 SYNTAX OF NON-PERIPHRASTIC CAUSATIVES

2.1 Lexical Causatives

As noted in chapter three, lexical causatives involve the expression of causation through a single predicate. That is, in this type of causative both the causing event and the caused event are expressed by the same predicate. For example, in (1),

both the hitting of the earthenware and the resulting breakage is expressed by the verb *bɔ́* 'break'.

(1). Ama bɔ̀-ɔ̀ àyówá nò
Ama break-COMPL earthenware DET
Ama broke the earthenware.

Thus, a lexical causative involves a single verb and, as such, can be associated with only one tense/aspect category at a time. This property of lexical causatives may derive from the fact that they are typically used to express direct causation. In prototypical direct causation, there is a spatio-temporal overlap between the action of the causer (causing event) and the resultant action of the causee or affected entity (caused event) and, therefore, the two events must be expressed with the same temporal reference (Shibatani and Pardeshi 2002:89-90).

Lexical causatives in Akan have a monoclausal structure like any simple (mono verb) sentence in the language. For instance, any adverb which occurs in the sentence would refer to both the causing and caused events (2-3).

(2)a. Kwame bɔ̀-ɔ̀ kúkúó nó ɛ́nórà
Kwame break-COMPL pot DET yesterday
Kwame broke the pot yesterday.

b. Ɛ̀nórà Kwame bɔ̀-ɔ̀ kúkúó nó
yesterday Kwame break-COMPL pot DET
Yesterday, Kwame broke the pot.

(3)a. Sika kùm̀-m̀ ɔ̀wɔ́ nó ǹtɛ́ḿǹtɛ́ḿ
Sika kill-COMPL snake DET quickly
Sika killed the snake quickly.

b. Oduro mùnímùní-ì dùsíní nó ǹkàkráǹkàkrá
Oduro roll.RED-COMPL log DET slowly
Oduro rolled the log slowly.

In Akan (temporal) adverbs may occur in sentence final position (2a) or sentence initial position (2b) (see Saah 2004). In a lexical causative (2a-b), a temporal adverb refers to both causing event, that is, Kofi's hitting the pot (perhaps with a stone) and the caused event, the pot's breaking. In other words, (2a-b) could not be used to describe a situation where Kofi at some point prior to yesterday hit the pot but it got broken yesterday. Similarly, in (3a), the manner adverb *quickly* refers both Sika's hitting the snake and the snake dying as a result of being hit. Here too, (3a) cannot be used to describe a situation where Sika quickly hits a snake (perhaps repeatedly) but the snake dies slowly from its strokes after some time has passed. Similarly, (3b) implies that both the causing event (rolling of the log) and the caused event (rolling of the stone) occurred slowly. Thus, because direct causation involves a spatio-temporal overlap between causing and caused events, any adverb which modifies the causing event also modifies the caused event. Syntactically, the fact that any adverb used in lexical causatives modifies both the causing and caused events shows that such constructions involve a simple, monoclausal structure.

Another test which evinces the monoclausal structure of lexical causatives is reflexivization. In a lexical causative since there is only one subject, it is only this argument which may control a reflexive. The reflexive in Akan is marked by a

pronoun + hő (see Saah 1989:16; Osam 2002). Consider the following examples in (4).

(4)a. Akosua$_i$ tĭ-ì nè hő$_i$
Akosua pinch-COMPL 3SG self
Akosua pinched herself.

b. [Kofi né Ama]$_i$ tĭtí-ì wɔ̀n hó$_i$
Kofi and Ama pinch.RED -COMPL 3PL self
Kofi and Ama pinched themselves.

(5). [Yaw né Akosua]$_i$ kà-à sɛ́ Yaa$_k$ bɔ̀-ɔ̀ nè hő$_k$
Yaw and Akosua say-COMPL that Yaa hit-COMPL 3SG self
Yaw and Akosua said that Yaa hit herself.

The sentences in (4a-b) illustrate that in a lexical causative the causer which is the subject of the sentence may control the reflexive. In (4b), it can be observed that when the subject of the sentence involves a conjoined noun phrase, the reflexive takes on a plural form to reflect the plural subject. We can contrast this with (5) which involves complementation. In the complement sentence (5), the conjoined subject does not control the reflexive because a reflexive can only refer back to an argument (subject) which is in the same clause as the reflexive. So in (5), Yaa (not Yaw and Akosua) controls the reflexive because it occurs in the same minimal clause as the reflexive.

Thus, we may conclude from the evidence above that Akan lexical causatives involve a simple monoclausal structure which is so constructed to show the higher level of semantic and syntactic integration between the events expressed by the single predicate.[1]

2.2 Cause-Effect Serialization

In chapter three, it was noted that serialized causatives share some crucial features with lexical causatives as they both tend to describe direct causation. In cause-effect serialization, even though two (or more) verbs are used, these verbs are conceptualized by speakers as a single predicate and, therefore, the concepts they express are lexicalized as such. In this section, we will examine some syntactic properties of serialized causatives which justify them as a type of non-periphrastic causative.

Cause-effect serialization, as the name suggests, is a type of serial verb constructions (SVC) – a phenomenon which is highly attested in Akan. A plethora of literature exists on recurring features of SVCs cross-linguistically (for example, Lord 1973; Sebba 1987; Durie 1997 Aikhenvald 2006) and SVCs in Akan (Christaller 1875; Essilfie 1977 and 1984; Lord 1993; Osam 1994a, 1997 and 2004; van der Veen 1998; Agyemang 2002; Hellan et al. 2003; Morrison 2007; Cansada 2010). Consequently, my intention in this section is not to rehash the discussion on SVCs in general. Rather, I will present some syntactic properties of cause-effect serialization and distinguish it from other kinds of causativization in the Akan language.

Generally, an SVC has been defined as "a sequence of verbs which act together as a single predicate, without any overt marker of coordination, subordination, or syntactic dependency of any other sort" (Aikhenvald 2006:1). Inherent in this definition is the idea that the verb series in an SVC form part of the same clause.

Also, the verbs in an SVC share the same tense/aspect/mood (TAM) (see section 3.1.2 for an exception). This can be done by marking the same TAM on all the verbs or by inflecting only the initial verb in the construction (Aikhenvald 2006:39). Akan employs the former option (6a-d).

(6)a. Ɔ̀-sùm̀-m̀ nó hwè-è fáḿ
3SGSUBJ-push-COMPL 3SGOBJ fall-COMPL down
He pushed him down.

b. Kofi á-bɔ̀ nó à-hwé fáḿ
Kofi PERF-hit 3SGOBJ PERF-fall down
Kofi hit him to the ground.

c. Kofi bɛ́-bɔ̀ nó à-hwé fáḿ
Kofi FUT-hit 3SGOBJ CONS-fall down
Kofi will hit him to the ground.

d. Kofi à-m̀-mɔ̀ nó à-ǹ-hwé fáḿ
Kofi PERF-NEG-hit 3SGOBJ PERF-NEG-fall down
Kofi did not hit him to the ground.

We note from (6a-c) that in cause-effect serialization all the verbs are inflected for the same tense/aspect category. In (6a), the verb series are each marked for the Completive aspect; in (6b), each of the two verbs takes Perfect aspect inflection. In (6c), however, Future is marked on the initial verb while the non-initial verb takes the Consecutive (see section 3.1.1 for more discussion on Future-Consecutive marking). In negation, each of the verbs in the series is inflected with a negative morpheme (6d).

Cause-effect SVCs have been identified as a type of Integrated Serial Verb Construction (ISVC), where the events coded by the verb series are conceptualized as "tightly integrated" and form a unitary event (Osam 1994a:193 and 2004:16). According to Osam (1994a:198), in this construction, "the object of the first verb is coreferential with the subject of the second verb." Thus, in (7), Kwame is the subject of the initial verb and stone is the object; however, stone is the entity which undergoes the action described by the non-initial verb. Consequently, cause-effect SVCs have been referred to as Switch-Subject serialization.

(7). Kwame tò-ò èbóɔ nó twéné-èɛ
Kwame throw-COMPL stone DET displace-COMPL
Kwame threw the stone away.

It must be noted, however, that even though there are two verbs in (7) the verb combinations represents a conceptually unitary event such that there is temporal overlap between the throwing and hitting. In other words, the verb combinations act as a single predicate to express direct causation. For instance, as Osam (1994a:200) points out, when we question what Kwame did we cannot have only a part of the sentence (with a single verb) as the answer. Thus, (8b) cannot be a felicitous answer to (8a); rather, an acceptable response to the question in (8a) would be (8c).

(8)a. Kwame yɛ̀-ɛ̀ dɛ́ń?
Kwame do-COMPL what
What did Kwame do?

b. ??Kwame tò-ò bóɔ́ nó
Kwame throw-COMPL stone DET
Kwame threw the stone.

c. Kwame tò-ò bóɔ́ nó twènέ-èɛ̀
Kwame throw-COMPL stone DET displace-COMPL
Kwame threw the stone away.

Thus, cause-effect SVCs of this type are purposive in nature such that even though we analyze the construction as consisting of sub-events they are perceived as, not two events, but a single integrated event. In this way, cause effect SVCs can be likened to lexical causatives as they tend to express causation as a unitary event.

However, not all cause-effect SVCs involve tightly integrated events as (7). In a cause-effect SVC where a causer may not intend the caused event there is less integration between the sub-events expressed by the verb series. This can be seen from the fact that in such constructions it is possible to insert a linker such as *má* between the causing and caused sub-events.

(9)a. Ò-pìá-à nó tò-ò fáḿ
3SGSUBJ-push-COMPL 3SGOBJ fall-COMPL down
He pushed him down.

b. Ò-pìá-à nó ***mà***-à nó
3SGSUBJ-push-COMPL 3SGOBJ ***RESUL***-COMPL 3SGOBJ
tɔ̀-ɔ́ fáḿ
fall-COMPL down
He pushed him so that he fell down.

(10)a. Opuni bɔ̀-ɔ́ Nti pĭrá-à nò
Opuni hit-COMPL Nti hurt-COMPL 3SGOBJ
Opuni hit Nti (and) hurt him.

b. Opuni bɔ̀-ɔ̀ Nti ***mà***-à nó
Opuni hit-COMPL Nti ***RESUL***-COMPL 3SGOBJ
pĭrá-àɛ̀
hurt-COMPL
Opuni hit Nti so that he got hurt.

(11)a. Ɔ̀krá nó bɔ̀-ɔ̀ ɔ̀wɔ́ nó kùm̀-m̀ nò
cat DET hit-COMPL snake DET kill-COMPL 3SGOBJ
The cat hit and killed the snake.

b. Ɔ̀krá nó bɔ̀-ɔ̀ ɔ̀wɔ́ nó ***mà***-à
cat DET hit-COMPL snake DET ***RESUL***-COMPL
nó wù-ìɛ̀
3SGOBJ die-COMPL
The cat hit the snake so that it died.

The examples in (9-11) involve Clause Chaining (CC) serialization where two clauses, each expressing a sub-event, can be linked by a conjunction. For instance, in (9a), there are two events, causing and caused events, but the causing event (pushing) may or may not have the caused event (falling down) as its purpose. In this case, a resultative marker may separate the two events, as shown in (9b). A similar situation obtains in (10a-b) and (11a-b). Example (11b) is interesting with regard to the form of the non-initial verb. In this sentence, when the caused event is expressed as a consequence of the causing event the causative verb *kúḿ* 'kill' alternates with its non-causative suppletive *wú* 'die' in expressing the resulting event. Thus (9-11) show that CC cause-effect SVCs may involve less direct causation than cause-effect ISVCs.

According to Essilfie (1984:60), cause-effect SVCs are a reanalysis of a biclausal causative deep structure with *má* as the causative "higher predicate." In other words, cause-effect SVCs underlyingly involve two clauses linked by the morpheme *má*. Thus, Essilfie (1984:60) argues that (12a) is derived from (12b) through "a deletion transformation [which] optionally deletes the causative indicator *má* in such a construction without affecting the grammaticalness or the meaning of the sentence."

(12)a. Òsún àbòfrá n hwîì fámù (Fa.)
he-pushed child the fell down
He pushed the child down (Essilfie 1984:56).

b. Òsún àbòfrá n máà òhwîì fámù (Fa.)
he-pushed child the caused he-fell down
He made the child fall down by pushing him (Essilfie 1984:56).

It must be noted, however, that (12a) and (12b) do not have exactly the same meaning; (12a) would be used to express a situation where a causer intentionally pushes the child to the ground while (12b) describes a situation where a causer pushes the child and as a result the child loses his footing and falls down. Thus, (12a) involves direct causation while (12b) involves indirect causation.

As demonstrated in (9-11), clause chaining cause-effect SVCs may allow for a resultative linker to link causing and caused events when indirect causation is involved. This, however, does not mean that all cause-effect SVCs are derived from a reduction of a biclausal sentence as claimed by Essilfie (1984). There are

situations where we cannot reduce a resultative construction to an SVC with the same meaning. Consider (13-14) below.

(13)a. Kwadwo pĭá-à Adwoa má-à nó
Kwadwo push-COMPL Adwoa RESUL-COMPL 3SGOBJ
bɔ̀-ɔ̀ àhwèhwɛ́ nó
break-COMPL mirror DET
Kwadwo pushed Adwoa so that she broke the mirror.

b. *Kwadwo pĭá-à Adwoa bɔ̀-ɔ̀ àhwèhwɛ́ nó
Kwadwo push-COMPL Adwoa break-COMPL mirror DET
Kwadwo pushed Adwoa (and) she broke the mirror.

(14)a. Yaw twà-à Akwasi mà-à nó
Yaw cut-COMPL Akwasi RESUL-COMPL 3SGOBJ
pĭrá-èɛ̀
injure-COMPL
Yaw kicked Akwasi so that he (Akwasi) got injured.

b. *Yaw twà-à Akwasi pĭrá-èɛ̀
Yaw kick-COMPL Akwasi injure-COMPL
Yaw kicked Akwasi and he (Akwasi) got injured.

Examples (13-14) show that not all biclausal consequence constructions may yield a cause-effect SVC. In (13a), when *má* is deleted the sentence does not yield an SVC with the same meaning. In other words, if one wanted to say 'Kwadwo pushed Adwoa and she broke the mirror' then (13b) would be ungrammatical. By the same token, when *má* is deleted in (14a), the resulting sentence (14b) cannot mean 'Yaw hit Akwasi so that Akwasi released it.' Essilfie (1984:61), however, attributes the ungrammaticality in these instances to the condition that "a non-causative verb in the construction would not allow the deletion of *má* from the sentence." However, the examples in (13a) and (14a) contain only causative verbs

and so we can say that the ungrammaticality of (13b) and (14b) is not subject to the condition above. What is interesting here is that the sentences in (13b) and (14b) may be grammatical with a different meaning (15).

(15)a. Kwadwo pĭá-à Adwoa bɔ̀-ɔ̀ àhwèhwɛ́ nó
Kwadwo push-COMPL Adwoa break-COMPL mirror DET
Kwadwo pushed Adwoa to hit the mirror (lit. Kwadwo pushed Adwoa hit mirror).

b. Yaw twà-à Akwasi pĭrá-èɛ̀
Yaw kick-COMPL Akwasi injure-COMPL
Yaw kicked Akwasi (and) he (Yaw) got injured.

Thus, the argument that cause-effect SVCs are derived from a deletion of "a causative indicator *má*" seems to be limited to only a set of few construction types and does not include the wide range of verbal combinations which may be used to express causation. Again, since cause-effect SVC involves direct causation while consequence constructions express indirect causation we do not need to subsume one construction under the other. Indeed, in cause-effect SVCs the verb combinations are so arranged to "convey a 'cause-effect' meaning" where both causing and caused events share the same spatio-temporal profile (Dixon 2012:244). On the other hand, as already noted, consequence constructions express a situation where a causer performs an action on an entity and as a result of the causer's action, the entity undergoes a particular change of state, aided or otherwise.

Cause-effect SVCs, like other SVCs in Akan, are monoclausal. This is not surprising because even though an SVC contains two or more verbs the verb series are conceptualized as expressing a single event just like a single predicate. One way of demonstrating the monoclausal properties of cause-effect SVCs is through reflexivization. In reflexivization in Akan, a reflexive pronoun takes a syntactic subject from its (i.e. the reflexive's) immediate (or local) clause as its controller. In cause-effect SVCs, only the initial NP may control the reflexive (16).

(16)a. Ama$_i$ dè sékáń twà-à nè hó$_i$
Ama take knife cut-COMPL 3SG self
Ama cut herself with a knife (i.e. Ama take knife cut herself)

b. Kwame$_i$ twà-à Kofi$_j$ pĭrá-à nè hó$_j$
Kwame cut-COMPL Kofi hurt-COMPL 3SG self
Kwame injured Kofi and hurt himself (in the process).

c. [Abrafi ne Frema]$_i$ pàmó-ò Kofi$_j$
Abrafi and Frema drive.away-COMPL Kofi
fĭrì-ì hɔ́ dwènè-è wɔn̄ hó$_i$
come.out-COMPL there think-COMPL 3PL self
Abrafi and Frema drove the man from there and thought about themselves.

(17)a. [Nti né Opuni]$_i$ kà-à sɛ́ Frema$_j$ á-tĭ nè hő$_j$
Nti and Opuni say-COMPL that Frema PERF-pinch 3SG self
Nti and Opuni said that Frema has pinched herself.

b. Kofi$_i$ fà-à sɛ́káń nà ɔ$_i$-dè twà-à nè ho$_i$
Kofi take-COMPL knife and 3SGSUBJ-take cut-COMPL 3SG self
Kofi took the knife and hurt himself.

In (16a), it is the (animate) subject, Ama, which controls the reflexive. In the cause-effect SVC (16b), there are two animate NPs, Kwame and Kofi, but because only Kwame is a subject in the sentence it alone controls the reflexive as shown by

the identical indices of Kwame and the reflexive. Likewise, (16c) shows that where there is a conjoined subject NP in a cause-effect SVC, the reflexive takes a plural form to reflect the plural subject. When we compare (16a-c) with (17a) it can be observed that the controller of the reflexive must be in the same clause as the reflexive. In (17), there are two subjects indexed (*i*) and (*j*) but since only the second subject (indexed (*j*)) shares the same clause as the reflexive it controls the reflexive. Thus, in (16a-c), the only subject in the sentence occurs in the same clause as the reflexive and, therefore, controls it (the reflexive). Also, (17b) shows that the subject of an upper clause cannot control a reflexive in a lower clause because the NP that controls a reflexive must occur in the same clause as the reflexive. Thus, in (17b) although the NP which controls the reflexive is coreferential with the subject of the upper clause it is the third person singular subject pronoun which controls the reflexive.

Adverbial modification also shows that cause-effect SVCs involve a single clause. Like other SVCs in Akan, in cause-effect SVCs, any adverb which occurs in the sentence modifies the entire construction rather than the sub-events expressed by the different predicates. For example, in (18a), the adverb *dèǹdéńdéń* refers to both the causing and caused events, that is, both the act of pushing and the subsequent act of falling down occurred violently. Similarly, in (18b), the manner adverb *ǹkàkraákàkrá* refers to both the agent's action and the resultant event. Thus, in cause-effect SVCs an adverb has necessary scope over the entire verb combination because the verb series function as a single presdicate.

(18)a. Owusu pìá-à Bonsu hwè-è fáḿ *dèǹdéńdéń*
Owusu push-COMPL Bonsu fall-COMPL down hard
Owusu pushed Bonsu down violently.

b. Adwoa hwĭé-è ǹsúó nó gù-ù *ǹkàkrâkàkrá*
Adwoa pour-COMPL water DET lie-COMPL gradually
Adwoa poured out the water gradually.

The foregone has demonstrated that lexical causatives and cause-effect SVCs involve a monoclausal structure. In both causatives, the predicate(s) is marked with a single tense/aspect/mood category per a construction and the scope of adverbial modification is the entire sentence. Also, because lexical causatives and cause-effect SVCs involve a single clause only the single subject of the sentence functions as the controller of a reflexive. With this threshold, the discussion that follows will explore the syntactic properties of another causative type namely, periphrastic causatives. It will be shown that on the one hand, periphrastic causatives share similar properties with non-periphrastic causatives but on the other hand, are significantly different in syntactic structure from the former.

3.0 SYNTAX OF ANALYTIC CAUSATIVES

In chapter three, it was noted that analytic causatives involve the expression of causation through a causative predicate *má* and another predicate expressing effect, as shown in (19a). However, in quasi-analytic causatives *má* occurs as a non-initial verb which links two events as causatively related (19b).

(19)a. Kwame mà-à Adwoa sù-ì
Kwame CAUS-COMPL Adwoa cry-COMPL
Kofi made Adwoa cry.

b. Kofi yɛ́ mà-à Adwoa kɔ̀-ɔ̀ fĭé
Kofi do CAUS-COMPL Adwoa go-COMPL home
Kofi caused Adwoa to go home.

In what follows, we explore the syntactic properties of analytic causatives with regard to tense/aspect and negation marking, reflexivization and adverbial modification to determine their clause structure.

3.1 Tense/Aspect/Negation

In Akan, analytic causatives typically involve a single tense/aspect category which is marked on all the verbs in the sentence, even as was observed in the case of cause-effect SVCs. Consider the sentences in (20) which involve marking of the Completive and Perfect aspects. The Completive is marked by a lengthening of the final vowel (or syllabic nasal) of a verb when the verb is followed by an object while the Perfect is marked by a prefix /a-/ on the verb.[2]

(20)a. Kofi mà-à Ama bɔ̀-ɔ̀ fáḿ
Kofi CAUS-COMPL Ama hit-COMPL ground
Kofi caused Ama to fall down.

b. Kofi á-mà Ama á-bɔ̀ fáḿ
Kofi PERF-CAUS Ama PERF-hit ground
Kofi has caused Ama to fall down.

Sentences (20a-b) show that in the analytic causative, when the causative verb verb is marked with the Completive or Perfect the non-initial predicate must also be marked with the same aspectual morpheme.

In the Future, a prefix /bɛ-/ is marked on the initial verb in a clause and, if there are more verbs, each of the non-initial verbs is marked by a prefix /a-/ which has been referred to as the Consecutive (Dolphyne 1987). The Consecutive also occurs on the non-initial verbs after the Progressive prefix /re-/ has been marked on the initial verb.

(21)a. Adu bɛ́-má Ama á-dì àdùàné nó
Adu FUT-CAUS Ama CONS-eat food DET
Adu will make Ama eat the food.

b. Araba ré-mà Ama é-dzì èdzìbán nó (Fa.)
Araba PROG-CAUS Ama CONS-eat food DET
Kofi is making Ama eat the food.

c. Kofi-ì má Ama á-dí àdùàné nó
Kofi-PROG CAUS Ama CONS-eat food DET
Kofi is making Ama eat the food.

In (21a), in expressing future time the prefix /bɛ-/ is marked on only the initial verb while the non-initial verb takes the Consecutive prefix /a-/. Likewise, in (21b), the Progressive is marked on the initial verb while the non-initial verb is marked with the Consecutive. However, in Asante (21c), the Progressive occurs as a suffix which is attached, not to the verb, but to the initial NP. Thus, even though the Progressive is represented as /re-/ in the orthography of Akan, this form is not preferred in the Asante dialect (see Osam 1994a:64).[3]

There has been some debate over whether or not to consider the so-called Consecutive as a separate category.[4] Indeed, different authors have referred to this category with different terms ('serial marker' a la Forson (1990), Osam (1994b) and Morrison (2007); 'infinitive' a la Boadi (2005b, 2008), Cansada (2010)). Understanding the so-called Consecutive is particularly important because in SVCs (which involve a single tense/aspect per a construction) the Consecutive occurs on non-initial verbs when the initial verb takes Progressive or Future marking. One way of dealing with this situation is to consider the pattern PROG-CONS/FUT-CONS as demonstrating a mixed tense/aspect in a sentence, as suggested by Dolphyne (1987:70) and, therefore, an exception to the general conception of SVCs as involving a single tense/aspect specification. This position would, however, require that we account for the fact that the Consecutive never occurs on its own or on an initial verb in a sentence but is totally dependent on the marking of an initial verb either in the Progressive or Future.

Alternatively, we could postulate that the pattern PROG-CONS/FUT-CONS does not involve mixed tense/aspect. As already noted, the so-called Consecutive does not occur on an initial verb or as the only aspectual category in a sentence but is always dependent on the Future or Progressive. Also, the Consecutive is not required to occur in non-manipulative complement sentences which have the matrix verb marked in the Future or Progressive.[5] Thus, the Consecutive is suspect as a separate aspectual category but appears to be an allomorph of the Progressive and the Future which marks non-initial events as prospective. For one thing, both Future and Progressive express imperfect meanings and may be considered as

related categories in that sense.[6] In fact, /bɛ-/ may be discounted as a strictly Future morpheme because it expresses primarily prospective meaning and future time reference is an aspect of the general irrealis paradigm (Saah 1994:17; see also Dixon 2012:9-11). Thus, in a sentence where the occurrence of an event B, is expressed as dependent on the occurrence of an imperfect, prospective event A, which is marked in the Future or Progressive, event B may be marked by a Prospective allomorph, as shown in (22).

(22)a. Kofi-ì kɔ́ fíé á-kɔ̀-dìdí
Kofi-PROG go home PROS-EGR-eat
Kofi is going home to eat.

b. Kofi bɛ́-kɔ́ fíé á-kɔ̀-dìdí
Kofi FUT-go home PROS-EGR-eat
Kofi will go home to eat.

A possible motivation for the use of an allomorph on the non-initial verb may be that, conceptually, as Osam (2004:26, ft 10.) notes, "when the initial verb is in the progressive, the subsequent ones cannot be in the progressive." This observation addresses, albeit partially, the question of why the so-called Consecutive never occurs alone in clauses but is dependent on the Future and Progressive in the language. It also calls into question whether Akan operates a tense system in the first place as the only categorical tense in the language, the Future, may be better considered as an aspectual category (see Kusmer 2011). Thus, a revision of the temporal system exploited in Akan is needed, but this is beyond the scope of this study.

In analytic causatives, negation is marked on all the verbs in the sentence. In Akan, negation is marked by a homorganic nasal prefix marked on the verb stem. Consider (23) below.

(23)a. Frema á-m̀-má àbòfrá nó à-ǹ-sú
Frema COMPL-NEG-CAUS child DET COMPL-NEG-cry
(i) Frema did not make the child cry.
(ii) Frema did not allow the child to cry.

b. Frema ḿ-mà-à àbòfrá nó ǹ-sù-ǐ
Frema NEG-CAUS-PERF child DET NEG-cry-PERF
Frema has not caused the child to cry.

c. Frema-à m̀-má àbòfrá nó ǹ-sù
Frema-PROG NEG-CAUS child DET NEG-cry
(i) Kwame will not cause the child to cry.
(ii) Kwame is not allowing the child to cry.

d. * Frema ḿ-mà-à àbòfrá nó sù-ǐ
Frema NEG-CAUS-PERF child DET cry-PERF
Frema has not caused the child to cry.

In Akan, negation has wide scope and it is marked on all the verbs in the causative sentence. In (23a), when the Completive, which is a prefix in affirmative sentences, is negated it is realized as prefix /a-/ on the verb. Similarly, in negating the Perfect, the negative prefix is marked on all the verbs but the Perfect (which is a prefix in the affirmative) is realized as a suffix (23b). The Progressive and the Future are negated in the same way. For that reason, the sentence in (23c) can be interpreted in either the Future or the Progressive based on pragmatic or contextual information. The sentence in (23d), however, shows that marking of negation in analytic causatives must occur on all verbs in the sentence and failure to mark all verbs with negative affix results in ungrammaticality.

It can be noted, however, that the negative prefixes attached to the verbs in (23a-c) are not negative heads (with independent negative scope) but may be considered as negative agreement markers (NAM) set by morphological rules of the language. This is confirmed by the fact that, in some Fante dialects, negation may be marked on only the initial verb in a serial verb construction (23a-c) (Osam 1994a:213). Notice that (23b) and (23c) have the same negative interpretation, showing that negation on the initial verb carries wide scope in Akan.

(23)a. Yɛ-bɔ-tɔ bi a-ma hom (Fa.)
1PLUSUBJ-FUT-buy some CONS-give 2PLUOBJ
We will buy some for you (Osam 1994a:213).

b. Yɛ-ro-n-tɔ bi m-ma hom (Fa.)
1PLSUBJ-PROG-NEG-buy some NEG-give 2PLUOBJ
We will not buy some for you (Osam 1994a:213).

c. Yɛ-n-kɔ-tɔ bi a-ma hom (Fa.)
1PLUSUBJ-NEG-FUT-buy some CONS-give 2PLUOBJ
We will not buy some for you (Osam 1994a:213).

Thus far, it has been shown that analytic causatives behave much like SVCs with regard to tense/aspect and negation marking; all the verbs in the causative are marked with the same tense/aspect/negation category. Thus, Shibatani (2008:269) observes that Akan analytic causatives "show the major hallmarks of monoclausality sharing with SVCs of the language such as tense-aspect-mood and polarity concord." Consequently, Akan analytic causatives have been sometimes classified under the general rubric of SVC (for example, Osam 1994a and 2004). An analysis which assumes causatives to be instantiation of serialization necessarily presupposes causatives to involve monoclausality. Such conclusions,

however, seem to be based on partial knowledge of the range of properties exhibited by causatives in the language. Interestingly, other syntactic properties of this construction reveal that causatives involve a more complex structure.

3.2 Adverbial Modification

It has long been recognized that periphrastic causatives behave quite differently from non-periphrastic causativization with regard to adverbial modification. Beginning with Fodor (1970) and expounded by Shibatani (1973a and 1976 for Japanese and Korean) and Wierzbicka (1975 for English), it has been shown that adverbial modification of analytic causatives demonstrates such constructions to involve a complex structure as opposed to non-periphrastic causatives which are basically monoclausal. A similar observation can be made with regard to analytic causatives in Akan.

As we observed earlier, in Akan (temporal) adverbs occur typically in sentence final position or may occur in sentence initial position as a topicalized element (Saah 1994:36).[7] Thus, the position of an adverb in a clause may indicate the boundary of that clause. In the simple sentences in (24a-b), the adverbs *ànɔ́pá* and *ɔ́kyénáˊ* may occur at the beginning of the sentence or in sentence final position respectively. In (24a-b), the scope of the adverb is over the predicate and, therefore, the event described by the verb is said to have occurred at the time specified by the temporal adverb.

(24)a. (*ànɔ̀pá yí*) Kofi kùm̀-m̀ ɔ̀wɔ́ nó (*ànɔ̀pá yí*)
morning this Kofi kill-COMPL snake DET morning this
(This morning) Kofi killed a snake (this morning).

b. (*ɔ̀kyéná*) Adwoa bɛ́-kɔ́ Kumasi (*ɔ̀kyéná*)
tomorrow Adwoa FUT-go Kumasi tomorrow
(tomorrow) Adwoa will go to Kumasi (tomorrow).

In an SVC, where two or more verbs are concatenated to express what is conceptualized as a single event, an adverb may be placed at sentence initial or final position just like in the simple sentences in (24). Here, the adverb has scope over all the verbs in the verb series (25). In (25a), the adverb *énórà* modifies both acts of buying the rice and giving it to Akosua. Thus, (25a) could not be used to describe a situation where Kofi bought the rice at a time prior to yesterday but gave it to Akosua yesterday. Similarly, in (25b), the two events described by the verbs, waking up and sweeping, must have both taken place in the morning, albeit successively.

(25)a. Kofi tɔ̀-ɔ̀ ɛ̀mó mà-à Akosua *énórà*
Kofi buy-COMPL rice give-COMPL Akosua yesterday
Kofi bought rice for Akosua yesterday.

b. Ama sɔ̀ré prá-à fíé *ànɔ̀pá yí*
Ama wake.up sweep-COMPL house morning this
Ama woke up and swept the house this morning.

The story is a little different in analytic causatives. In this construction, the scope of an adverb may be limited to only a part of the sentence and, therefore, the entire sentence is not automatically modified by the adverb. Consider the examples in (26) below.

(26)a. Afriyie mà-à Adwoa sù-ɨ *énórà*
Afriyie CAUS-COMPL Adwoa cry-COMPL yesterday
Afriyie made Adwoa cry yesterday.

b. Darko mà-à Yaw kɔ̀-ɔ̀ sùkúù *ènnɛ́*
Darko CAUS-COMPL Yaw go-COMPL school today
Darko made Yaw go to school today.

Sentences (26a-b) are ambiguous with regard to the temporal reference of the causing and caused events. (26a) has two interpretations: either (a) Kofi may have performed an action prior to yesterday which caused Adwoa's to cry, or (b) both Kofi's action and Adwoa's change of state occurred yesterday. Similarly, (26b) is ambiguous with regard to whether (a) Darko ordered Yaw yesterday to attend school and Yaw complied today or (b) both the causing and caused events occurred today.

Interestingly, it is possible to have two adverbs modifying the causing and caused events in an analytic causative respectively. For instance, in (27a), the causing event is modified by the expression *dè àbùfúó* 'angrily' while the caused event is modified by the adverb *ǹtɛ́ńtɛ̀mì* 'quickly'. Similarly, as shown in (27b), in an analytic causative, the causing and caused event may be modified by two temporal adverbs which anchor the two events in different temporal reference. In an SVC, however, because the verbs series together express a unitary event each of the sub-events cannot be modified by a different adverb, hence, the ungrammaticality of (27c).

(27)a. Appiah *dè àbùfúó*[8] mà-à Yaw sèsá-à
Appiah take anger CAUS-COMPL Yaw collect-COMPL

ǹnéɛ́má nó *ǹtɛ́ńtɛ̀mì*
things DET quickly
Appiah angrily made Yaw collect the things quickly.

b. *Ɛ́nóràˌ* àkórɔ́mfóɔ́ yí (yɛ́) mà-à *ànɔ̀pá yí*
yesterday thieves these do CAUS-COMPL morning this

m-à-kɔ́tɔ́ ǹ-krádò m̀mìɛ̀ǹsá
1SGSUBJ-PERF-buy PL-padlock three
Yesterday, the thieves caused me to buy three padlocks this morning (i.e. because of the thieves yesterday, I have bought three padlock this morning).

c. **Ɛ́nórà* Kofi frɛ́-ɛ̀ Adwoa (**ànɔ̀pá yí*)
yesterday Kofi call-COMPL Adwoa morning this

sòmá-à nò (**ànɔ̀pá yí*)
send-COMPL 3SGOBJ morning this
Yesterday, Kofi called Adwoa and sent her this morning.

Thus, the position and scope of adverbs in causatives cast doubts on the status of causatives as SVCs and, therefore, monoclausal structures. Indeed, if 'single eventhood' is invoked as a necessary and sufficient condition for SVCs then analytic causatives cannot be identified as SVC, as aptly articulated by Shibatani (2008):

> … if the expression of a unitary single event is a defining criterion of SVCs, [analytic] causatives expressing indirect causation of the type seen above are certainly not SVCs despite their superficial formal resemblance to true SVCs and despite their sharing some crucial syntactic properties characterizing monoclausality (Shibatani 2008:270).

Thus, while some defining criteria for SVC-hood such as same tense-aspect-polarity marking strongly associates causatives with SVCs on one hand, other criteria such as single eventhood dismiss causatives as SVC on the other. However, it would appear that some criteria for SVC-hood may, in fact, be 'tendencies' and not necessary and sufficient conditions in themselves. For instance, as Osam (2004:19) observes, there are constructions which are generally accepted as SVC but exhibit mixed tense/aspect in the verb series. Example (28) is a clause chaining SVC where the verb series share the same subject (Ama) and have two symmetrical direct objects (food and song). However, (28) involves mixed Perfect-Progressive aspects, although SVCs are generally thought to involve a single tense/aspect/mood specification.

(28). Ama á-dì àdùàné nó-ó tó dwóḿ
Ama PERF-eat food DET-PROG sing song
Ama has eaten the food and is singing.

By the same token, a construction would not be categorized as an SVC simply because it displays harmonizing tense/aspect and negation marking. Thus, it appears that the best way to deal with serial verb constructions is by looking at them as clusters of features and identifying the contexts in which each does or does not exhibit features traditionally assumed for SVCs. In this type of approach we would be intentionally avoiding the necessary and sufficient conditions approach of the classical theory of categorization. Instead, we will be dealing with prototypicality of each type of construction based on what is typically assumed for SVCs and show where and when each of these types of constructions converge and

or diverge with those assumptions. I will return to the issue of position of adverbs in causatives which sets them apart from all Akan SVCs in section 3.2.2. For now, however, I will discuss reflexivization in causatives and what it tells us about the clause structure of analytic causatives.

3.3 Reflexivization

As already noted in section 2.2, reflexivization in Akan is marked by two forms, a pronoun and a relator noun *hó* 'self' which together occur as a (direct) object in the clause (Saah 1989; Osam 2002). Saah (1989:16) shows that the reflexive is "necessarily coreferent with some structurally defined local antecedent," that is, a reflexive can only refer to an entity which is located in its immediate clausal domain. Reflexivization in analytic causatives shows them to involve a complex structure. Compare the examples in (29) and (30) below.

(29)a. Ɔ̀$_i$-tɔ-ɔ kàà$_j$ mà-à nè hó$_i$
3SGSUBJ-buy-COMPL car give-COMPL 3SG self
He bought a car for himself.

b Mm̀-mɔfrá$_i$ nó dè sékáń$_j$ twà-à wɔn hó$_i$
PL-child DET take knife cut-COMPL 3PL self
The children cut themselves with a knife.

(30)a. Akua$_i$ mà-à mé$_j$ tì-ì mè hó$_j$
Akua CAUS-COMPL 1SG pinch-COMPL 1SG self
Akua made me pinch myself.

b. Naasei$_i$ mà-à wɔ$_j$ fèfé-è wɔn̂ hó$_j$
Naasei CAUS-COMPL 3PL vomit.RED-COMPL 3PL self
Naasei caused/made them vomit on themselves.

c. *Wɔ$_i$-mà-à Akua$_j$ tĩ-ĩ wɔn̂ hó$_i$
3PL-CAUS-COMPL Akua pinch-COMPL 3PL self
They made Akua pinch themselves.

Examples (29a-b) show that in monoclausal sentences the initial NP which is the only syntactic subject in the sentence functions as the controller of the reflexive, as shown by the coindexing of the reflexive and subject. Accordingly, in (29a), the third person singular subject pronoun agrees in person and number with the reflexive. Likewise, in (29b), the reflexive takes on a plural form to reflect the plural subject. In (30a-b), however, we observe that the reflexive does not take the initial NP subject (the causer) as its controller, as shown by the different indexation on the reflexive and the initial subject NP. Rather, the reflexive takes the non-initial NP (the causee) as its controller and so the reflexive agrees in person and number with the causee NP. The reason for this is that whiles the causee NP occurs in the immediate clause of the reflexive, the causer NP is outside this clause and, therefore, cannot control the reflexive. Thus, (29c) is ungrammatical because the causer cannot control the reflexive as it is outside the clause in which the reflexive occurs.

The fact that in (30a-b) the causee NP controls the reflexive, however, shows that the causee NP is a subject as only subjects may control reflexives in a sentence in the language (Saah 1989). Thus, there appears to be two subjects in analytic causatives each of which occurs in a different clause. Therefore, we may conclude that analytic causatives involve a bi-clausal structure where one subject (causer NP) and the causative predicate constitute a matrix clause and another subject (causee NP), a predicate of effect and/or a reflexive (direct object) constitutes an embedded clause.

The discussion on the syntactic properties of analytic causatives so far has revealed that on the one hand, analytic causatives behave like SVCs in terms of how they mark tense/aspect and negation but they also show a biclausal structure in adverbial modification and reflexivization and are therefore not SVCs. I suggest, however, that both stances do not mutually exclude each other from being true. In other words, analytic causatives in Akan show different degrees of affinity to each type of construction and, therefore, the best way to understand the nature of these causatives is to look at the extent to which their properties demonstrate one or the other construction type. In the section that follows, I will demonstrate that the extent to which an analytic causative may exhibit a complex syntactic structure depends on the expression of the causee argument in the sentence.

3.4 Two Types of Analytic Causatives: '*ɔ*' and '*no*' Causatives

In Akan, the causee argument in the analytic causative may be realized either as subject or object. Causative formation is a valence increasing operation which adds one more argument to an already formed clause and this may result in the rearrangement of syntactic and semantic roles of the participants in the sentence (see Dixon 2000:47).[9] In many languages, this restructuring may result in alternative means of expressing some of the (original) arguments based on the new syntactic and semantic role(s) they may now perform in the causative sentence (for examples, see Cole 1976 for Hebrew; Cole 1983 for Bolivian Quechua, Hungarian and Kannada; Alsina 1992 for Chichewa; Shibatani 1973b and Miyagawa 1999 for Japanese; Kozinsky and Polinsky 1993 for Korean; Seungju 2006 for Korean and Japanese; Kemmer and Verhagen 1994 for Dutch).

Table 4.1 provides the various coding strategies of arguments in the causative which are attested crosslinguistically.

Table 4.1. ***Coding of arguments in causative of transitive*** **(Dixon 2000:48)**

Type	Causer	Original A (Causee)	Original O (Affectee)
1	A(gent)	Special marking	O(bject)
2	A	Retains A-marking	O
3	A	Has O-marking	Has O-marking
4	A	O	Non-core
5	A	Non-core	O

As shown in Table 4.1, there are four ways in which the causee argument in the causative may be realized in language: (a) the causee may receive a special marking reserved for only causee arguments; (b) it may retain its grammatical coding as an Agent; (c) it may be marked as an object; (d) it may simply move out of the core. In Akan, the expression of the causee argument in the causative may follow any of the patterns in the grey shaded area in Table 4.1. Because Akan does not mark case morphologically, the different realization of the causee in the causative can be seen clearly only when the causee argument is pronominalized (31-33). The different realization of the causee argument of the causativized sentence, however, is often held to be a reflection of dialectal variation in the language (Saah 1989; Osam 1994b, 2004; Lord et al. 2002).[10]

(31). *Causative of intransitives*

a. Ɔ̀-sù-ɨ̀
3SGSUBJ-cry-COMPL
He/she cried.

b. Araba má-à **ɔ̀**-sú-ì (Fa.)
Araba CAUS-COMPL **3SGSUBJ**-cry-COMPL
Araba caused him/her to cry.

c. Araba mà-à **nó** sù-ɨ̀
Araba CAUS-COMPL **3SGOBJ** cry-COMPL
Araba caused him/her to cry.

(32). *Causative of monotransitives*

a. Ò-kùm̀-m̀ nò
3SGSUBJ-kill-COMPL 3SGOBJ
He/she killed him/her.

b. Kwabena má-à **ɔ̀**-kúm̀-m̀ nò (Fa.)
Kwabena CAUS-COMPL **3SGSUBJ**-kill-COMPL 3SGOBJ
Kwabena caused him/her to kill him/her.

c. Kwabena mà-à **nó** kùm̀-m̀ nò
Kwabena CAUS-COMPL **3SGOBJ** kill-COMPL 3SGOBJ
Kwabena caused him/her to kill him/her.

(33). *Causative of ditransitives*

a. Ɔ̀-kyɛ̀-ɛ̀ nò sɨ̀ká
3SGSUBJ-give-COMPL 3SGOBJ money
He/she gave him/her money (as a gift).

b. Yaw má-à **ɔ̀**-kyɛ́-ɛ̀
Yaw CAUS-COMPL **3SGSUBJ**-give-COMPL

nò sɨ̀ká (Fa.)
3SGOBJ money
Yaw caused him/her to give him/her money (as a gift).

c. Yaw mà-à **nó** kyɛ̀-ɛ̀ nò sɨ̀ká
Yaw CAUS-COMPL **3SGOBJ** give-COMPL 3SGOBJ money
Yaw caused him/her to give him/her money.

The above examples (31-33) illustrate the different realization of the causee argument in causative of intransitives (31a-c), monotransitives (32a-c) and ditransitives (33a-c). In each case, the (a) version shows how arguments in the simplex (non-causativized) construction are marked; the (b) version illustrates that the causee can be realized as a grammatical subject and the (c) version indicates that the causee can also be coded as a grammatical object. Also, as indicated in the examples above, the expression of the causee as subject is preferred in the Fante dialect while the Twi dialects (Asante, Akuapim and Akyem) prefer the causee with object marking. The affectee argument, however, is always marked as an object in the causative regardless of how the causee is marked. I will refer to the (b) versions as the '*ɔ*' causative and the (c) versions as '*no*' causative.

Significantly, however, the different marking of the causee (in the different dialects) does not result in any differences in meaning of the causatives. In fact, the Fante sentences are acceptable and used in the Twi dialects simply by changing the tonal melody of the sentence to reflect that of the Twi dialects. Hence, the Fante sentences (31b), (32b) and (33b) correspond to the Twi (Asante) versions (34a), (34b) and (34c) respectively. Thus, in both Fante and Asante the causee may be marked as subject but as object only in Asante (Twi dialects) not in Fante.

(34)a. Araba mà-à ó-sù-ì
Araba CAUS-COMPL 3SGSUBJ-cry-COMPL
Araba caused him/her to cry.

b. Kwabena mà-à ó-kùm̀-m̀ nò
Kwabena CAUS-COMPL 3SGSUBJ-kill-COMPL 3SGOBJ
Kwabena caused him/her to kill him/her.

c. Yaw mà-à ɔ́-kyè-è nò sĩká
Yaw CAUS-COMPL 3SGSUBJ-give-COMPL 3SGOBJ money
Yaw caused him/her to give him/her money (as a gift).

While the different expressions of causee do not correspond to any semantic difference in the different dialects the preference of one form over the other in a dialect should not be taken for granted as it points to different syntactic and semantic processes ongoing in the respective dialect(s). I shall point to these developments as and when they become apparent in the discussion. It will also be shown that the alternative coding of the causee argument is not superficial but reflects different syntactic properties of the causative constructions. As before, however, I will use Asante as a default dialect.

3.4.1 Previous Analyses

The different marking of the causee in Akan causatives has been commented on by Saah (1989), Osam (1994a:198 and 2004:41-42), Campbell (1998:55), Lord et al. (2002:224) and Yoon (2007). Two main opposing views have been articulated regarding the two causatives: (a) they are instances of serialization; (b) they are biclausal. A common thread which runs through all these analysis, however, is that the two causatives involve the same structure. This assumption implies that the two causatives may only be associated with one construction type at a time because they have the same structure. Lord et al. (2002), however, is a notable exception. They categorize the '*no*' causative as an SVC but '*ɔ*' causative as a verb-complement sentence. I take this analysis to be on the right path and provide evidence as to why this may be so. It would emerge from the discussion that the

'ɔ' and '*no*' causatives display different syntactic properties under the same tests. It will be shown that each of the causatives is a better example of a different construction type rather than being a homogenous construction type, SVC or otherwise.

3.4.2 Testing the Two Causatives

Clearly, causatives in Akan seem to involve more structure than SVCs as shown by reflexivization and adverbial modification. However, the two causatives do not have the same properties. In this section, we adduce evidence from the placement of adverbs in the causatives to show their syntactic differences. It will be shown that while the 'ɔ' causative displays a wide range of properties akin to complement clauses in Akan, the '*no*' causative tends to have a limited set of properties which indicate clausal embedding.

(a) *Adverb Placement*

The function(s) of adverbs in delineating grammatical structure is sometimes obscured by their analysis as adjuncts of the clause. However, adverbs may not be analyzed merely as adjuncts because they behave much the same way as other functional categories in the clause (see Cinque 1999 and 2004). As already noted, the position of adverbs may indicate a clause boundary. In monoclausal sentences, adverbs do not occur between a verb and its noun complement (direct object) and this explains why (35) is ungrammatical in the language. However, adverbs may occur in sentence-medial positions in complement constructions. As shown in (36a), an adverb may occur between an overt complementizer and a complement

subject in which case the adverb has scope over only the embedded clause. Also, it is possible to have two different adverbs modifying each clause in the complement sentence, one for the matrix clause and the other for the subordinate clause (36b).

(35) *Kofi bɔ̀-ɔ̀ *ɛ̀nóràà* nó kùm̀-m̀ nó
Kofi hit-COMPL yesterday 3SGOBJ kill-COMPL 3SGOBJ
Kofi hit and killed it yesterday

(36)a. Ama kà-à sɛ́ *ɔ̀kyénáá* ɔ̀-bɛ́-kɔ́ Kùmásî
Ama say-COMPL COMP tomorrow 3SGSUBJ-FUT-go Kumasi
Ama said that she will go to Kumasi tomorrow.

b. *Ɛ́nóràà* Ama kà-à sɛ́ *ɔ̀kyénáá*
yesterday Ama say-COMPL COMP tomorrow
ɔ̀-bɛ́-kɔ́ Kùmásî
3SGSUBJ-FUT-go Kumasi
Yesterday, Ama said that tomorrow she will go to Kumasi.

The '*ɔ*' and '*no*' causatives, however, behave differently with regard to the positions available for adverbial insertion. Consider the following examples.

(37). Ɔ̀héné nó mà-à *ɛ̀nóràà* pàpá nó kɔ̀-ɔ̀ fíé
chief DET CAUS-COMPL yesterday man DET go-COMPL home
The chief let the man go home yesterday.

(38)a. Ɔ̀héné nó mà-à *ɛ̀nóràà* **ɔ̀**-kɔ̀-ɔ̀ fíé
chief DET CAUS-COMPL yesterday **3SGSUBJ**-go-COMPL home
The chief let him go home yesterday.

b. Ɔ̀héné nó mà-à *ɛ̀nóràà* **yɛ̀**-kɔ̀-ɔ̀ fíé
chief DET CAUS-COMPL yesterday **1PLSUBJ**-go-COMPL home
The chief let us go home yesterday.

c. Ɔ̀héné nó mà-à *ɛ̀nóràà* **wɔ̀**-kɔ̀-ɔ̀ fíé
chief DET CAUS-COMPL yesterday **3PLSUBJ**-go-COMPL home
The chief let them go home yesterday.

(39)a. Ɔ̀hénέ nó mà-à (*ɛ̀nórà) **nó**
chief DET CAUS-COMPL yesterday **3SGOBJ**

(*ɛ̀nórà) kɔ̀-ɔ́ fíé
yesterday go-COMPL home
The chief let him go home yesterday.

b. Ɔ̀hénέ nó mà-à (*ɛ̀nórà) **wɔ́ń**
chief DET CAUS-COMPL yesterday **3PLOBJ**

(*ɛ̀nórà) kɔ̀-ɔ́ fíé
yesterday go-COMPL home
The chief let him go home yesterday.

c. Ɔ̀hénέ nó mà-à (*ɛ̀nórà) **yɛ́ń**
chief DET CAUS-COMPL yesterday **1PLOBJ**

(*ɛ̀nórà) kɔ̀-ɔ́ fíé
yesterday go-COMPL home
The chief let us go home yesterday.

As (37) shows, when the causee is a lexical NP an adverb may occur between the causative verb and the causee NP, in which case the adverb has scope over only the embedded clause. In (38a-c), when the causee occurs as a (pronominal) subject an adverb modifying the embedded clause may occur between the causative verb and the causee NP. However, (39a-c) show that when the causee is expressed as a (pronominal) object an adverb cannot occur between the causative verb and the causee NP neither can it occur between the causee NP and the embedded predicate. Thus, the different positions available for adverbial insertion in the '*ɔ*' and '*no*' causatives suggest that the two constructions do not have the same clausal structure. While the '*ɔ*' causative allows for adverbial insertion like a complement construction, the '*no*' causative shows higher integration between its constituents and, therefore, departs from complement sentences in not allowing adverbial insertion between constituents.

(b) ***Mixed Tense/Aspect and Negation Marking***

According to Osam (1994a:274), "in complement constructions, it is possible to have different aspectual markings on the main clause and the complement clause verbs [and] it is also possible to negate only one of the verbs." Interestingly, whenever adverbial insertion in the embedded clause is possible in the causative there can be different tense/aspect and negation marking for the causative predicate and the verb of effect. Here too, we find a disparity between the '*ɔ*' and '*no*' causatives in the language. Consider the examples in (40-41) which involve mixed COMPL-PROG and PERF-FUT aspects.

(40)a. Kwame mà-**à** (ɛ̀nórà) Ama-**á**
Kwame CAUS-**COMPL** (yesterday) Ama-**PROG**

kɔ́ nó ná ò-ò-sú
go CD[11] when 3SGSUBJ-PROG-cry
Kwame caused it that (yesterday) Ama was crying when she was leaving.

b. Kwame mà-**à** (ɛ̀nórà) ɔ́-**ɔ́**-kɔ́
Kwame CAUS-**COMPL** (yesterday) 3SGSUBJ-**PROG**-go

nó ná ò-ò-sú
CD when 3SGSUBJ-cry
Kwame caused it that (yesterday) she was crying when she was leaving.

c. *Kwame mà-**à** (*ɛ̀nórà) nó-**ó**
Kwame CAUS-**COMPL** (yesterday) 3SGOBJ-**PROG**

kɔ́ nó ná nò-ò sú
go CD when 3SGOBJ-PROG cry
Kwame caused it that (yesterday) she was crying when she was leaving.

(41)a. Somua **á**-mà (ɔ̀kyénά) Kumi **bɛ́**-kɔ́ Kumasi
Somua **PERF**-CAUS (tomorrow) Kumi **FUT**-go Kumasi
Somua has caused it that (tomorrow) Kumi will go to Kumasi.

b. Somua **á**-mà (ɔ̀kyénáˊ) ɔ̀-**bɛ́**-kɔ́ Kumasi
Somua **PERF**-CAUS (tomorrow) 3SGSUBJ-**FUT**-go Kumasi
Somua has caused it that (tomorrow) he will go to Kumasi.

c. *Somua **á**-mà (*ɔ̀kyénáˊ) nó **bɛ́**-kɔ́ Kumasi
Somua **PERF**-CAUS (tomorrow) 3SGOBJ **FUT**-go Kumasi
Somua has caused it that (tomorrow) he will go to Kumasi.

Examples (40-41) show that where adverbial modification of the embedded clause is possible the embedded predicate may receive a different tense/aspect marking from the causative predicate. In (40a-b), when the causative predicate is marked in the Completive the embedded predicate may take the Progressive aspect. Thus, (40c) is ungrammatical because the sentence does not allow adverbial insertion into the embedded clause because of the object marked causee. Similarly, (41a-b) shows that when the causee is a lexical NP or subject (where adverbial scope on embedded clause may obtain), the causative predicate can be marked in the Perfect while the embedded predicate may receive Future marking. However, when the causee occurs as object we cannot have mixed tense/aspect marking of the causative predicate and the verb of effect, hence, the ungrammaticality of (41c).[12]

Furthermore, the '*ɔ*' and '*no*' causatives differ with regard to negation marking. It can be observed from (42a-b) that when the causee is marked as subject, the embedded predicate may be independently negated. However, when the causee occurs as object it does not allow for independent negation of the embedded clause and so (42c) is ungrammatical.

(42)a. Osei mà-à (ènné) Kusi à-**ǹ**-kɔ́ sùkúù
Osei CAUS-COMPL today Kusi COMPL-**NEG**-go school
Osei caused it that today Kusi did not go to school.

b. Osei mà-à (ènné) ɔ-à-**ǹ**-kɔ́ sùkúù
Osei CAUS-COMPL today 3SGSUBJ-COMPL-**NEG**-go school
Osei caused it that today he/she did not go to school.

c. *Osei mà-à (*ènné) no à-**ǹ**-kɔ́ sùkúù
Osei CAUS-COMPL today 3SGOBJ COMPL-**NEG**-go school
Osei caused it that today he/she did not go to school.

The examples in (40-42) clearly demonstrate that the two causatives do not exhibit the same syntactic properties. It can be observed that while both causatives involve a complex structure the '*ɔ*' causative shows more properties of a complement sentence than does the '*no*' causative. The '*no*' causative, however, seems to involve a more integrated structure especially with regard to the object marked causee and the causative predicate on the one hand, and the embedded predicate on the other. In the rest of this chapter, I explore various ways of accounting for the different marking of the causee and their implications for the structure of the two causatives.

3.5 Structure of the Causatives

As iterated in sections 3.1.2 and 3.1.3, analytic causatives seem to involve a complex structure where a causer NP and the causative verb *má* form a matrix clause while a causee NP and a predicate of effect constitute an embedded clause (43).

(43). [NP_{causer} *má* [NP_{causee} V …]]

The structure in (43), however, appears to violate a condition about complement sentences in Akan that "every complement construction has to have a complementizer" (Osam 1998:25) because there is no overt complementizer in the structure.[13] Nevertheless, it can be noted that (43) is a common structure of causatives in many Kwa languages. In Ewe, Ga and Dangme, the causative may occur with or without a complementizer (see Table 4.2 below).

Table 4.2. ***Analytic Causative Constructions in Kwa***

Language	Causer Subj.	Causative Verb	Comp	Causee Subj.	Causee Obj.
Ewe	NP	*na*	*bɛ*	NP	
	NP	*na*		NP	
Ga	NP	*ha*	*ni*	NP	
	NP	*ha*		NP	
Dangme	NP	*ha*	*nɛ*	NP	
	NP	*ha*		NP	
Akan	NP	*ma*	*ma*	NP	
	NP	*ma*		NP	
	NP	*ma*			NP

Ewe (Anlo dialect)[14]

(44)a. E-na me ɖu nu
3SGSUBJ-CAUS 1SGSUBJ eat thing
S/he made me eat.

b. E-na be me ɖu nu
3SGSUBJ-CAUS COMP 1SGSUBJ eat thing
S/he made me eat.

Ga[15]

(45)a. E-ha e-fo
3SGSUBJ-CAUS 3SGSUBJ-cry
S/he made him/her cry.

b. E-ha ni e-fo
3SGSUBJ-CAUS COMP 3SGSUBJ-cry
S/he made him/her cry.

Dangme (Ceasar and Duah 2011:6)

(46)a. E-ha i-ye ni ɔ
3SGSUBJ-CAUS 1SGSUBJ-eat food DET
S/he made me eat the food.

b. E-ha nɛ i-ye ni ɔ
3SGSUBJ-CAUS COMP 1SGSUBJ-eat food DET
S/he made me eat the food.

Examples (44-46) show that an overt complementizer in causatives may be optional in some Kwa languages. Interestingly, the causative in Akan may occur with an overt complementizer in the Fante dialect, in which case the causee can only be marked as subject. In (47), there is an overt complementizer *má* which is homophonous and related to the causative predicate.

(47). Ɔ̀-má-à **mà** ò-sú-ɨ̌[16] (Fa.)
3SGSUBJ-CAUS-COMPL **COMP** 3SGSUBJ-cry-COMPL
He made him cry.

Thus, the causative is a complement construction which involves an overt complementizer but as we have observed the sentence may occur without a complementizer (48a-b). Interestingly, even in many Fante sub-dialects, (48b) occur more frequently than (48a).

(48)a. **[**$_{S}$ NP_{causer} *má* **[**$_{CP}$ mà **[**$_{S}$ NP_{causee} V … **]]]**

b. **[**$_{S}$ NP_{causer} *má* **[**$_{CP}$ Ø **[**$_{S}$ NP_{causee} V … **]]]**

The optionality of the complementizer in the causative can be explained by looking at the semantics of the causative verb on the one hand and the function of the complementizer in complement sentences on the other. As noted by Osam (1998:27) "the complement clause introduced by *má* refers to an event or state which is the result of the influence of a higher controlling Agent on a lower Agent." In other words, *má* complementation always involves successful manipulation. As Osam (1998:27) observes, although the complementizer *má* usually takes a manipulative verb when a non-manipulative verb occurs in a sentence where *má* is a complementizer it "assumes a manipulative sense, and so [is] able to code successful manipulation." Thus, while the complement sentence (without *má*) (49a) does not express successful manipulation, when the same verb is used with *má* as a complementizer the sentence expresses successful manipulation (49b).

(49)a. Kofi frɛ́-è Esi dɛ́[17] ɔ́-ḿ-brà (Fa.)
Kofi call-COMPL Esi COMP 3SGSUBJ-OPT-come
Kofi called Esi that she should come (Osam 1998:28).

b. Kofi frɛ́-è Esi má ɔ̀-bá-è (Fa.)
Kofi call-COMPL Esi COMP 3SGSUBJ-come-COMPL
Kofi called Esi and she came (Osam 1998:28).

Simialrly, in a situation where the matrix clause contains a manipulative verb it is the complementizer which would express successful manipulation or otherwise (Osam 1998:26-28). Thus, even though the same manipulative verb occurs in the matrix clause in both (50a) and (50b), only (50b) implies successful manipulation.

(50)a. Kofi hyɛ̀-ɛ̀ Ama sɛ́ ɔ́-ń-nóá àdùànέ nó
Kofi force-COMPL Ama COMP 3SGSUBJ-OPT-cook food DET
Kofi ordered Ama to cook the food.

b. Kofi hyɛ̀-ɛ̀ Ama má ɔ́-nóá-à
Kofi force-COMPL Ama COMP 3SGSUBJ-cook-COMPL
àdùáŋ nó (Ak.)
food DET
Kofi forced Ama to cook the food.

The (near) minimal pair of sentences in (49a-b) and (50a-b) show that it is the complementizer *mά* which codes successful manipulation of a patient by an agent and not necessarily the matrix predicate. The causative predicate *mά*, however, can be set apart from all other manipulative verbs in the language as it always expresses successful manipulation. In other words, whenever causative *mά* is used it always implies that a stronger agent initiates an action (or refrains from initiating an action) which results in a change of state of a patient. Hence, in Akan, this causative verb does not occur with the non-implicative complementizer *sɛ́* as sentences involving this complementizer may not express successful maipulation. On the other hand, as we observed in (47) the causative verb may take the implicative complementizer *mά*. However, in this case, because the underlying semantics of the causative verb involves successful manipulation there is duplication of function between the causative verb and the implicative complementizer. Thus, the implicative complementizer would become redundant in function and may, therefore, be omitted from the sentence for the reason of economy.

It is clear that analytic causatives usually involve some sort of complementation strategy because they typically express indirect causation where the causing event performed by a stronger agent has a different spatio-temporal profile from the caused event (Shibatani and Pardeshi 2002). Needless to say, different languages express this notion of causation in many ways depending on strategies available in a language. In Akan, indirect causation is expressed through a complement strategy which involves a high level of event integration. However, as we have iterated, in the causative the complementizer is optional and the preferred construction is to have the sentence without an overt complementizer (48). The omission of the complementizer in the causative, however, has further semantic and syntactic implications for the complement sentence.

As already noted, the difference in the expression of the causee argument does not correspond to a difference in meaning of the two causatives. However, the two causatives display different syntactic properties and degrees of integration between the events expressed in the matrix and embedded clause. The point of departure between the causatives, however, begins with the optionality of the complementizer in the causative. Of the two causatives, only the '*ɔ*' causative is compatible with an overt complementizer (51).

(51)a. Ɔ̀-má-à mà ò-sú-ĭ (Fa.)
3SGSUBJ-CAUS-COMPL COMP 3SGSUBJ-cry-COMPL
He made him cry.

b. *Ɔ̀-má-à mà nó sú-ĭ (Fa.)
3SGSUBJ-CAUS-COMPL COMP 3SGOBJ cry-COMPL
He made him cry.

Of course, (51b) is unacceptable because in the Fante dialect the causee may only be marked as subject and not object. (51b), however, is bizarre for a syntactic reason. In order for an NP to be assigned a syntactic role by a category (in this case a verb marking an NP as object) the NP and the verb must form a minimal constituent. As illustrated in (52a), this condition is met in (51a) because the causee NP and the embedded predicate form a constituent (c_2) excluding the complementizer (c_1) so the causee NP can be marked as subject by the embedded predicate. On the other hand, in (51b), represented as (52b), the matrix predicate and the causee NP do not form a minimal constituent because that string is interrupted by the presence of the complementizer, hence, the causee cannot be marked as a (direct) object by the causative predicate.

(52)a. **[**$_{C_0}$ NP_{causer} ***má*** **[**$_{C_1}$ COMP **[**$_{C_2}$ **NP_{causee}** V … **]]]**

b. **[**$_{C_0}$ NP_{causer} **[**$_{C_1}$ ***má*** **[**$_{C_2}$ COMP **[**$_{C_3}$ **NP_{causee}** V …**]]]]**

Thus, the '*no*' causative may occur only when there is no intervening element between the causative verb and the causee NP and this may be achieved by omitting the complementizer in the construction. In the Twi dialects which prefer the '*no*' causative the complementizer does not occur and, therefore, the causative verb may mark the causee as object. We, however, need to account for the fact that the causee NP which appears to reside in the subject position of an embedded predicate can be realised as an object. Below are some possible analyses.

3.5.1 Raising

One analysis which may be employed to account for the object marked causee is *raising*. It is generally held that in Akan "all complement clauses have to have a subject NP" (Osam 1994a:262) and that "the subject position after a complementizer must always be filled by either a lexical NP or an overt pronoun" (Saah 1994:120). In other words, in the causative the complement clause has an overt subject, a causee, which may occur as a lexical NP or a pronominal subject. However, the causee may also occur as object (with accusative case) in the causative. Thus, one may argue that for the causee to be marked as direct object of the causative verb the causee argument is raised out of the subject position in the complement clause into the direct object position of the causative verb (53a).[18]

(53)a. **[** NP_{causer} *má* NP_{causee} **[** <NP_{causee}> V … **]]**

b. **[** NP_{causer} *má* NP_{causee} **[** V … **]]**

As shown in (53b), a raising analysis would associate the causee NP as an argument of the causative verb, reducing the embedded clause to include only the embedded verb. Thus, this analysis accounts for the accusative marking of the causee by showing that the causee NP is a direct object of the matrix verb, hence, there cannot be an intervening element (like an adverb) between the causee and the causative predicate. This analysis would lead us to expect that an adverb can be inserted between the causee NP and the embedded predicate since the causee NP is

not an argument of the embedded predicate. However, as we have demonstrated in (37-39) above, no adverb may intervene between the object marked causee and the embedded predicate. In effect, while a raising analysis correctly derives an object causee, it does not forestall any close syntactic relationship between the causee NP and the embedded predicate. Also, raising places the causee NP outside of the embedded clause and, therefore, obscures some grammatical functions of this NP in the embedded clause. In other words, raising tells only half of the story of the functions of the object marked causee NP in the causative construction.

3.5.2 Extended Object Marking

Alternatively, the '*no*' causative may be analyzed as a case of *extended object marking* or what has been referred to as *exceptional case marking* (ECM) in the Generative literature. Campbell (1998:56) argues that there is a "structural parallel" between the '*ɔ*' and '*no*' causative in that both take a complement clause and the causee NP occurs in the same environment. Thus, in both causatives, the causee NP functions as the subject of the embedded clause but in the case of the '*no*' causative the matrix predicate marks the causee NP as an object (54).

(54). **[** NP_{causer} *má* **[** NP_{causee} V … **]]**

The structure in (54) correctly predicts that there can be no intervening element between the matrix predicate and the object marked causee NP because the causee NP and the matrix predicate form a contiguous constituent. Thus, this analysis maintains a biclausal structure where the causee NP is in the subject position in the

embedded clause and predicts that in the '*no*' causative there can be no overt complementizer between the matrix predicate and the causee NP. Also, (54) would account for the fact that an adverb cannot occur between the causee NP and the embedded predicate in that the causee NP functions as the subject of the embedded predicate and no adverb may occur between a subject and a verb in a clause.

There is evidence that the object marked causee NP has subject properties in the causative construction. Osam (1994a, 1996) observe that, in Akan, subjects have different behavioral properties from objects with regard to control of zero anaphora in clause chaining. For instance, "in Akan, only NPs that bear the subject relation control the deletion, under coreferentiality, of a second and subsequent NPs in clause chaining" (Osam 1994a:158). Thus, in (55a), the subject of the sentence, Yaw, controls the deletion of pronominal marking on the non-initial verbs under coreference. Accordingly, (55b) is ungrammatical because an object must always be overtly expressed in the sentence and, therefore, cannot be deleted under coreference.

(55)a. Yaw frɛ́-é Yaa Ø-sòmá-à nò
Yaw call-COMPL Yaa 3SGSUBJ-send-COMPL 3SGOBJ
Ø-kɔ̀-ɔ̀ Nkran
3SGSUBJ-go-COMPL Accra
Yaw called Yaa and sent her to Accra.

b. *Yaw frɛ́-é Yaa Ø-sòmá-à Ø
Yaw call-COMPL Yaa 3SGSUBJ-send-COMPL 3SGOBJ
Ø-kɔ̀-ɔ̀ Nkran
3SGSUBJ-go-COMPL Accra
Yaw called Yaa and sent her to Accra.

Interestingly, however, an object marked causee may control the deletion of pronominal marking on non-initial verbs in the causative. Consider the following examples in (56a-c).

(56)a. Wɔ̀-kà-à sɛ́ ɔ̀-kɔ̀-ɔ́ fíé
3PLSUBJ-say-COMPL COMP 3SGSUBJ-go-COMPL home

Ø-kɔ̀-nòá-à àdùàné Ø-dì-ìɛ̀
3SGSUBJ-go-cook-COMPL food 3SGSUBJ-eat-COMPL
They said that he went home to cook and eat.

b. Wɔ̀-mà-à ɔ̀-kɔ̀-ɔ́ fíé
3PLSUBJ-CAUS-COMPL 3SGSUBJ go-COMPL home

Ø-kɔ̀-nòá-à àdùàné Ø-dì-ìɛ̀
3SGSUBJ-go-cook-COMPL food 3SGSUBJ-eat-COMPL
They made him go home to cook and eat.

c. Wɔ̀-mà-à nó kɔ̀-ɔ́ fíé
3PLSUBJ-CAUS-COMPL 3SGOBJ go-COMPL home

Ø-kɔ̀-nòá-à àdùàné Ø-dì-ìɛ̀
3SGSUBJ-go-cook-COMPL food 3SGSUBJ-eat-COMPL
They made him go home to cook and eat.

The example in (56a) shows that in a complement sentence the embedded subject controls deletion of pronominal marking on non-initial verbs in the clause. In (56b), the subject marked causee NP is the agent of the subsequent events described by the non-initial verbs in the embedded clause and, therefore, it controls the deletion of pronouns on the non-initial verbs. Similarly, (56c) shows that despite the fact that the causee is expressed as object it controls the zero pronominal marking on the non-initial verbs under coreference.

Another piece of evidence that the causee NP, subject or object marked, functions as the subject of the embedded clause can be seen in reflexivization. In section 3.1.3 it was pointed out that in Akan, only an NP which functions as subject may control a reflexive (57).

(57)a. Kofi$_i$ dè sékáń$_k$ twà-à nè hõ$_i$
Kofi take knife cut-COMPL 3SG REFL
Kofi cut himself with a knife.

b. Yaw ne Abena$_i$ sùró sɛ́ Ama$_k$ bé-pírá nè hõ$_k$
Yaw and Abena fear that Ama FUT-hurt 3SG REFL
Yaw and Abena fear that Ama will hurt herself.

c. Wɔ$_i$-mà-à nó$_k$ pìrá-à nè hõ$_k$
3PLSUBJ-CAUS-COMPL 3SGOBJ hurt-COMPL 3SG REFL
They caused him to hurt himself.

d. *Wɔ$_i$-mà-à nó$_k$ pìrá-à wɔn̄ hõ$_k$
3PLSUBJ-CAUS-COMPL 3SGOBJ hurt-COMPL 3PL REFL
They caused him to hurt themselves.

The sentences above show that in an SVC, it is the only subject of the sentence, the initial NP, which controls the reflexive (57a). In the complement sentence (57b), there are two subjects, one in the matrix clause (Yaw and Abena) and the other in the embedded clause (Ama), but it is the subject of the embedded clause which controls the reflexive. Similarly, in the causative (57c), the object marked causee NP controls the reflexive because it functions as subject of the embedded clause. Thus, in (57c), the reflexive takes the third person singular form as the object marked causee NP showing that the latter controls the former. However, (57d) is ungrammatical because the reflexive takes the form of the matrix subject

and so the causee NP, the subject of the embedded clause, cannot control the reflexive.

Thus, one way to think of the '*no*' causative is that in this construction the object marked causee NP forms an overlapping constituent with the causative verb on the one hand, and the embedded verb on the other (58).

(58). **[**$_{C_0}$ NP_{causer} *má* **[**$_{C_1}$ **NP_{causee}]** V … **]** '*no*' causative

The structure in (58) maintains a biclausal structure for the '*no*' causative but also shows a restructuring of the complex causative sentence to reflect the dual role of the object marked causee NP. The overlapping constituents in (58) represent different clausal domains; the initial constituent (c_o) represents the matrix clause with the causee NP as a direct object of the causative predicate while the second constituent (c_1) involves the embedded clause where the causee NP functions as the subject of the clause.

It can be noted, however, that (58) shows the '*no*' causative to involve argument sharing, a fundamental property of SVCs. Thus, the '*no*' causative has sometimes been cited as an instance of Switch-Subject serialization (Osam 1994a, 2004). Still, the term switch-subject suggests that there is a switch in the function of the causee NP from object to subject in the causative sentence but this cannot be the case. In other words, the '*no*' causative does not exhibit a fluid structure where the causee argument shifts in function(s). Rather, it seems that the causee argument in

the '*no*' causative is *symmetrically shared* by the causative predicate and the verb of effect (see Hiraiwa and Bodomo 2008).[19] Consequently, in the '*no*' causative we cannot insert any element between the object marked causee NP and the causative verb or the between the object marked causee NP and the verb of effect because the object marked causee NP simultaneously forms a constituent with both predicates. Thus, symmetric sharing of the object marked causee involves simultaneous sharing of the causee NP by two syntactic constituents.

On the other hand, the '*ɔ*' causative cannot be considered to involve argument sharing of the causee NP. In fact, the '*ɔ*' causative does not demonstrate switch-subject serialization as sometimes assumed. For one thing, the subject marked causee is not a (direct) object of the causative predicate but only occurs as a subject of the embedded clause. As I will demonstrate in the next section, the fact that an adverb can occur between the subject marked causee NP and the causative predicate indicates that that causee NP is not an argument of that verb. Rather, in this causative, the whole embedded clause functions as a complement of the causative predicate.

4.0 GRAMMATICAL RELATIONS

The grammatical relations of the causative has been extensively studied in different languages over the years and some emerging cross-linguistic tendencies have been reported in the literature (for example, Comrie 1976; Wali 1981; Cole 1983; Kemmer and Verhagen 1994; Dixon 2000). The discussion on the different syntactic means of coding participants (NPs) in the causative has been divergent

with regard to the principles which motivate or determine the realization of syntactic roles in this construction. Two main analyses have emerged: (a) syntactic relations in the causative are solely motivated by syntactic principles; (b) the different grammatical realization of NPs in the causative is regulated by semantic and pragmatic factors evident in the causative construction expressed in a language. In the remainder of this chapter, I discuss the grammatical relations exhibited in the causative in Akan and the relevant factors in determining the status of the individual NPs with regard to their grammatical function in the causative sentence.

4.1 Status of Arguments in Causative of (di)transitives

As already noted in 3.2, the causative adds an extra argument to the non-causativized sentence. For instance, the sentence in (59a) involves two participants, an Agent and a Theme, and the former is the subject of the sentence while the latter is the object. However, in causativization an extra argument, a causer, is added to the construction increasing the valency from two in (59a) to three (59b). Causativization, however, results in a reassignment of syntactic positions and semantic roles in the sentence; the causer becomes subject, the causee becomes subject or object and the affectee retains its object status.

(59)a. Frema bɔ-ɔ tòá nó
Frema break-COMPL bottle DET
Frema broke the bottle.

b. Yaw mà-à Frema bɔ-ɔ tòá nó
Yaw cause-COMPL Frema break-COMPL bottle DET
Yaw made/caused Frema to break the bottle.

According to Comrie (1976), grammatical relations in the causative (but more generally, relative clauses; see Comrie and Keenan 1977) are regulated by two syntactic principles namely, the *case hierarchy* and *doubling constraint*. The case hierarchy predicts case assignment of NPs on one hand, while the doubling constraint prohibits objects from duplicating in simple clauses.

Regarding how the case hierarchy operates, Comrie (1976) states the following:

> The surface exponency of the embedded subject depends on the syntactic arguments of the embedded verb: if it has no direct object, then the embedded subject appears as direct object; if it has a direct object but no indirect object, then the embedded subject appears as indirect object; if it has both direct and an indirect object, then the embedded subject appears as one of the other oblique cases (Comrie 1976:262).

> Subject > Direct Object > Non-Direct Object > Other Oblique (Comrie 1976:262).

Thus, the case hierarchy predicts that in the causative of a transitive verb, the causee is marked as a non-direct object since the embedded verb already has a direct object (that is, the Affectee NP). However, this is not the case in Akan causatives. Rather, as observed in section 3.2 above, the causee in Akan causatives may be marked either as subject or object in the sentence. Consequently, the sentence in (59b) can be realized either as (60a) or (60b) in the language.

(60)a.	Ɔ̀-mà-à	**ɔ́**-bɔ̀-ɔ	nò[20]
	3SGSUBJ-cause-COMPL	**3SGSUBJ**-break-COMPL	3SGOBJ
	He caused him to break it.		

b. Ɔ̀-mà-à **nó** bɔ̀-ɔ̀ nò
3SGSUBJ-cause-COMPL **3SGOBJ** break-COMPL 3SGOBJ
He caused him to break it.

Examples (60a) and (60b) appear to violate the case hierarchy and the doubling constraint. This is because per the case hierarchy and the doubling constraint, we would expect the causee to be realized only as a non-direct object. However, in (60a), the causee is marked as subject which makes up two subjects although the case hierarchy would predict a non-direct marking of the causee and the doubling constraint prohibits duplication on syntactic subjects in the causative. Likewise, (60b) appears to sidestep the doubling constraint in that both the causee and affectee NPs are expressed as direct object in the sentence. However, to determine whether or not we have a genuine case of syntactic doubling on direct objects in (60b), we need to demonstrate that the two objects (causee and affectee) have direct object status in the causative sentence.

Dixon (2000:48) observes that in languages where there are two objects in the causative, "only one of the arguments has the full properties of an O[bject]" and the affectee generally has second object status in the sentence. It seems, however, that we can distinguish Akan from this generalization. In what follows, I examine the status of objects in Akan causatives by looking at how these NPs behave with respect to word order, relativization and focus marking. Of the three tests, however, direct object-hood can be best observed in word order; relativization and focus marking would only serve as supplementary criteria for determining direct object-hood in a sentence (see Osam 1994a:172).

4.1.1 Word Order

Akan exhibits a rigid word order and so the positions of arguments are generally non-negotiable (Osam 1994a). In this language, a direct object immediately follows the verb, as shown in (61a-b). In an SVC (61a), each verb has a direct object which immediately follows the verb and it is not possible to rearrange their positions in the clause. Likewise, in a ditransitive construction (62b), only the Recipient NP (Akosua) can immediately follow the verb and any attempt to switch the position of the Recipient NP with the Theme NP (shoes) results in an ungrammatical sentence (61c). Thus, the two postverbal NPs (Recipient and Theme) do not have equal status in a sentence; the Recipient NP is a direct object while the Theme NP is referred to as asymmetrical object (see Osam 1994, 2004).

(61)a. Kwadwo tɔ-ɔ m̀pàbòá kyɛ̀-ɛ̀ Akosua
Kwadwo buy-COMPL shoes give-COMPL Akosua
Kwadwo bought shoes for Akosua (as a gift).

b. Kwadwo kyɛ̀-ɛ̀ Akosua m̀pàbòá
Kwadwo give-COMPL Akosua shoes
Kwadwo gave Akosua shoes (as a gift).

c. *Kwadwo kyɛ̀-ɛ̀ m̀pàbòá Akosua
Kwadwo give-COMPL shoes Akosua
Kwadwo gave shoes to Akosua shoes (as a gift).

Accordingly, we can say that the two objects in the '*no*' causative are both direct objects but of different verbs. As shown in (62), the causee NP immediately follows the causative verb; likewise, the affectee NP occurs immediately after the non-initial verb (of effect). Thus, the two objects in (62) qualify as direct objects on the basis of their word order (or position) relative to the verbs in the sentence.

(62). Kwame mà-à nó bò-ò nó
Kwame CAUS-COMPL 3SGOBJ beat-COMPL 3SGOBJ
Kwame made him beat him.

Additionally, in Akan, "if a sentence has a direct object nothing can come between it and the verb" (Osam 1998:39). The sentences in (63-64) show that an adverb cannot occur between a verb and its direct object. The (a) versions show that a direct object must directly follow the verb, and the (b) versions show that any attempt to break the sequence between a verb and its direct object by inserting an adverb results in an ungrammatical sentence.

(63)a. Kofi bɔ̀-ɔ̀ nò
Kofi hit-COMPL 3SGOBJ
Kofi hit him.

b. Kofi bɔ̀-ɔ̀ (*ɛ́nórà) Ama *ɛ́nórà*
Kofi hit-COMPL yesterday Ama yesterday
Kofi hit Ama yesterday.

(64)a. Adwoa tɔ̀-ɔ̀ káà mà-à nò
Adwoa buy-COMPL car give-COMPL 3SGOBJ
Adwoa bought a car for him.

b. Adwoa tɔ̀-ɔ̀ (*ɛ́nórà) káà mà-à (*ɛ́nórà)
Adwoa buy-COMPL yesterday car give-COMPL yesterday
nò *ɛ́nórà*
3SGOBJ yesterday
Adwoa bought a car for him yesterday.

A similar observation can be made with regard to the causative. As shown in (65a-b), the object must directly follow the verb and no other element can be inserted between the object marked causee NP and the causative verb or the object marked

affectee NP and the verb of effect. However, as shown in (65c), when the causee is marked as subject, it allows for an adverb to be inserted between it and the causative verb which shows that the causee NP is not a direct object of the causative verb.

(65)a. Yaw mà-à nó bò-ò nó
Yaw CAUS-COMPL 3SGOBJ beat-COMPL 3SGOBJ
Yaw made him beat him.

b. Yaw mà-à (*énórà) nó bò-ò (*énórà) nó énórà
Yaw CAUS-COMPL yesterday 3SGOBJ beat-COMPL yesterday 3SGOBJ yesterday
Yaw made him beat him yesterday.

c. Yaw mà-à (énórà) ɔ-bò-ò (*énórà) nó (énórà)
Yaw CAUS-COMPL yesterday 3SGSUBJ-beat-COMPL yesterday 3SGOBJ yesterday
Yaw made him beat him yesterday.

4.1.2 Relativization and Focus

It has been noted in the literature that "any constituent in an Akan sentence can be focused" (Saah 1994:101), that is, "virtually all elements in a clause, including direct objects can be relativized or focused" (Osam 1994a:172).[21] There are, however, some NPs which cannot be extracted. For example, in a ditransitive sentence only the Recipient NP (which is a direct object) and not the Theme NP may be relativized, again evincing the unequal (asymmetric) status of the two objects (66a).[22] Thus, in (66b) because 'child' is a direct object it can be relativized but this is not so with 'chicken' because it is not a direct object but an

asymmetric object (66c). The ungrammatical sentence in (66c), however, may be repaired through *de* serialization where *àkɔ́kɔ́* 'chicken' (Theme NP) would function as a direct object of *de* 'take' and may therefore be relativized (66d).

(66)a. Kofi mà-à àbɔ̀frá nó àkókɔ́
Kofi give-COMPL child DET chicken
Kofi gave the child (a) chicken (Osam 1994a:171).

b. Àbòfrá nò â Kofi má-à nò
child DET REL Kofi give-COMPL 3SGOBJ
àkókɔ́ nó á-bà
chicken DET PERF-come
The child who Kofi gave (a) chicken to has come (Osam 1994a:173).

c. *Àkókɔ́ â Kofi má-à àbòfrá nó à-wù
chicken REL Kofi give-COMPL child DET PERF-die
The chicken that Kofi gave to the child is dead (Osam 1994a:173).

d. Àkókɔ́ nó â Kofi dé má-à àbòfrá nó à-wù
chicken DET REL Kofi take give-COMPL child DET PERF-die
The chicken that Kofi gave to the child is dead.

A similar situation obtains in focusing objects in a ditransitive sentence. Because the objects in a ditransitive clause do not have the same object status in the sentence, they behave differently when focused. Thus, in (67a), only the direct object NP may be focused (67b) but not the Theme NP (67c).

(67)a. Yaa brɛ̀-ɛ̀ Ama àtààdéɛ́ fɛ̀ɛ̀fɛ́ bî
Yaa bring-COMPL Ama dress beautiful some
Yaa brought Ama a beautiful dress.

b. Ama ná Yaa brɛ̀-ɛ̀ nò àtààdéɛ́ fɛ̀ɛ̀fɛ́ bî
Ama FOC Yaa bring-COMPL 3SGOBJ dress beautiful some
It was for Ama that Kofi brought a nice dress.

c. *Àtààdéɛ́ fɛ̀ɛ̀fɛ́ bí nà Yaa brɛ̀-ɛ̀ Ama
dress beautiful some FOC Yaa bring-COMPL Ama
It was a nice beautiful dress that Yaa brought (for) Ama.

In an SVC (68), however, the different objects may undergo relativization and may be focused. As shown in (68b-c), either the initial object (the man) or the non-initial object (the woman) (69c) may be relativized. Likewise, the two objects in (69a) may each be focused in the sentence (69b-c). Thus, relativization and focus extraction of each object in (68-69) show that both objects in an SVC are direct objects of the verb they follow.

(68)a. Yaa frɛ́-ɛ̀ pàpá nó má-à màámé nó
Yaa call-COMPL man DET give-COMPL woman DET
Yaa called the man for the woman.

b. Pàpá nó â Yaa frɛ́-ɛ̀ nó má-à
man DET REL Yaa call-COMPL 3SGOBJ give-COMPL
màámé nó á-bà
woman DET PERF-come
The man that Yaa called for the woman has come.

c. Màámé nó â Yaa frɛ́-ɛ̀ pàpá nó má-à
woman DET REL Yaa call-COMPL man DET give-COMPL
nó nó á-bà
3SGOBJ CD PERF-come
The woman that Yaa called the man for has come.

(69)a. Akosua dè àtààdéɛ́ fɛ̀ɛ̀fɛ́ bí brɛ̀-ɛ̀ Ama
Akosua take dress beautiful some bring-COMPL Ama
Akosua brought a beautiful dress for Ama.

b. Ama nà Yaa dè àtààdéɛ́ fɛ̀ɛ̀fɛ́ bí brɛ̀-ɛ̀ nó
Ama FOC Yaa take dress beautiful some bring-COMPL 3SGOBJ
It is (for) Ama that Yaa brought a beautiful dress.

c. Àtàadéɛ́ fɛ̀ɛ̀fɛ́ bî nà Yaa dè brɛ̀-ɛ̀ Ama
dress beautiful some FOC Yaa take bring-COMPL Ama
It is a beautiful dress that Yaa brought for Ama.

In the causative, both the causee and affectee NP may be relativized or focused showing that they are direct objects (70b-c) and (71b-c).

(70)a. Tîkyà nó mà-à m̀-mɔ̀frá nó twèrɛ́-ɛ̀ nsɔ̀hwɛ́
Teacher DET CAUS-COMPL PL-child DET write-COMPL exams
The teacher made the children write exams.

b. M̀-mɔ̀frá nó â Tîkyà nó mà-à wɔ́ń
PL-child DET REL Teacher DET CAUS-COMPL 3PLOBJ
twèrɛ̀-ɛ̀ nsɔ̀hwɛ́ nó á-dédá
write-COMPL exams DET PERF-sleep
The children that the teacher made to write the write exams are asleep.

c. Ǹsɔ̀hwɛ́ nó â Tîkyà nó mà-à m̀-mɔ̀frá nó
exams DET REL teacher DET CAUS-COMPL PL-child DET
twèrɛ̀-ɛ̀ nó yɛ́ dɛ̀n
write-COMPL DET be hard
The exams which the teacher made the children write was difficult.

(71)a. Opoku mà-à Achiaa wàré-è òsîkànî
Opoku CAUS-COMPL Achiaa marry-COMPL rich man
Opoku made Achiaa marry a rich man.

b. Achiaa nà Opoku mà-à nó
Achiaa FOC Opoku CAUS-COMPL 3SGOBJ
waré-è òsìkànî
marry-COMPL rich man
It was Achiaa that Opoku made her marry the rich man.

c. Òsìkànî nà Opoku má-à Achiaa warè-ɛ̀ɛ̀
rich man FOC Opoku CAUS-COMPL Achiaa marry-COMPL
It was a rich man that Opoku made Achiaa marry.

As was noted at the beginning of this section, relativization and focus marking are not full proof tests of direct object-hood in the language because in Akan any NP constituent may be focused or relativized. For instance, as shown in (72a-c) and (73a-c), in a complement sentence the embedded subject or object may each be focused. Similarly, (73b-c) show that both the embedded subject and object may be relativized.

(72)a. Nti pɛ̀ sɛ́ Frema kɔ́ fíé
Nti want COMP Frema go home
Nti wants Ama to go home.

b. Frema nà Nti pɛ́ sɛ̀ ɔ-kɔ́ fíé
Frema FOC Nti want COMP 3SGSUBJ-go home
It is Frema that Nti wants her to go home.

c. Èfíé nà Nti pɛ́ sɛ̀ Frema kɔ́
home FOC Nti want COMP Frema go
It is home that Nti wants Frema to go.

(73)a. Owusu kà-à sɛ́ Asiedu à-tɔ́ káà
Owusu say-COMPL COMP Asiedu PERF-buy car
Owusu said that Asiedu has bought a car.

b. Asiedu â Owusu kà-à sɛ́ ɔ́-à-tɔ́
Asiedu REL Owusu say-COMPL COMP 3SGSUBJ-PERF-buy
káà nó á-bà
car DET PERF-come
Asiedu who Owusu said bought the car has come.

c. Káà â Owusu kà-à sɛ́ Asiedu á-tɔ́
car REL Owusu say-COMPL COMP Asiedu PERF-buy DET
nó à-sɛ́è̀
DET PERF-spoil
The car that Owusu said Asiedu bought has spoiled.

Thus, extraction of an NP constituent may not in itself show the constituent to be a direct object, especially where multiple verbs (and objects) are involved. Nevertheless, since all direct objects can be extracted in a construction in the language, relativization and focus marking are relevant supplementary parameters for determining the status of an object in a construction. It has been established, however, that the object marked causee NP is a direct object of the causative verb and the affectee NP is a direct object of the verb of effect. On the other hand, the subject marked causee NP is not a direct object of the causative verb but functions as the subject of embedded clause. Thus, the different coding of the causee argument in Akan analytic causatives is not superficial but signal different grammatical relations of the NP constituents in the sentence. Contrary to the prediction of the case hierarchy and the prohibition of the doubling constraint, the '*no*' causative involves two direct objects (the object marked causee and the affectee NP) which belong to different verbs in the sentence. The grammatical relations exhibited in the '*no*' causative is the same found in partial lexicalized SVCs in the language showing the close affinity, in syntactic properties, of the '*no*' causative to serialization.

5.0 SUMMARY

I conclude this chapter by providing a summary of the different syntactic properties of causatives in relation to other construction types in Table 4.3. It can be observed that the '*ɔ*' causative displays all the features of complement sentences surveyed here. On the other hand, the '*no*' causative shares almost all the properties of an SVC except for the notion of single eventhood.

Table 4.3. ***Comparative Syntactic properties of complement sentences and complex predicates*** **(SVCs)**

Syntactic Properties	Complement Sentence	'ɔ'-causative	'no'-causative	SVC
(i). *marker of subordination*	+	+	-	-
(ii). *mixed tense/aspect (apart from* PERF-PROG)	+	+	-	-
(iii). *contrast in polarity*	+	+	-	-
(iv). *independent adverbial modification of sub-event*	+	+	-	-
(v). *verbs code single event*	-	-	-	+
(vi). *symmetrical (direct) objects*	-	-	+	+

The evidence, thus, shows that each of the causatives is a *better example* of a different construction type rather than constituting a homogenous construction. As has been demonstrated throughout this chapter, the different coding of the causee argument in Akan causatives is neither coincidental nor superficial but rather it signals different degrees of syntactic integration involved in the two causatives. While the '*no*' causative displays an integration of the matrix and embedded in an overlapping structure, the 'ɔ' causative involves a relatively low level of syntactic integration but maintains appreciable level of syntactic dependency and complementation. Thus, it is emphasized that rather than insist on necessary and sufficient conditions on identifying a clause as an instance of a category, it is more beneficial to consider the prototypicality of each type of construction based on what is typically assumed for a category and show where the properties displayed by the construction in question converge or diverge with those assumptions. In this way we would avoid the proverbial 'throwing away the baby with the bath water.'

Causative sentences express various force dynamic patterns and properties which can recovered from the context of an interaction. In the next chapter, I will isolate some specific force dynamic patterns and properties and group them as constituting a major even type of causation expressed in Akan causatives.

ENDNOTES

[1] While the conclusion that lexical causatives in Akan are simple monoclausal structures is uncontroversial this is not so for other languages. There has been an active discussion of lexical causatives in agglutinative languages, for example Japanese, with regard to whether or not they have complex syntactic structure. For details, see Harley (1995 and 2006), Miyagawa (1999) and Manning et al. (1999).

[2] It must be noted that in Akan the Completive (COMPL) is marked on the second verb in a contiguous verb series. Thus, as shown in (1a-b), where there is no overt object between V_1 and V_2, the Completive is marked only on the non-initial verb(s).

(1)a. Yaw hùrî tè-è àǹkàá nó bì
Yaw jumped pluck-COMPL oranges DET some
Yaw jumped and plucked some of the oranges.

b. Frema tɔ̀-ɔ̀ m̀pàbòá kyè-è mè
Frema buy-COMPL shoe give-COMPL 1SGOBJ
Frema bought me a shoe (as a gift).

For more discussion on the different manifestations of the completive aspect, see Saah (2002), Osam (2004) and Boadi (2008).

[3] The Progressive is the only context in Akan where an aspectual category is marked on a nominal (or determiner) rather than a verbal predicate. More research is needed to ascertain the extent to which Progressive marking in Asante involves nominal tense/aspect marking. For a detailed discussion of nominal tense/aspect marking in different languages, see Nordlinger and Sadler (2001, 2004).

[4] The earliest reference to the Consecutive, as far I know, dates back to Christaller's monumental work on the grammar of Akan (Christaller 1875).

[5] For a discussion on manipulative and non-manipulative complementation strategies in Akan, see Osam (1998).

[6] Interestingly, both the Progressive and Future take the same negative form, as shown in (2a-c), suggesting a close link between these two temporal categories.

(2)a. Kofi-ǐ sú
Kofi-PROG cry
Kofi is crying.

b. Kofi bé-sú
Kofi FUT-cry
Kofi will cry.

c. Kofi ǹ-sú
Kofi NEG-cry
(i) Kofi will not cry.
(ii) Kofi is not crying.

[7] See Saah (1994) and (2004) for a survey on the distribution of adverbs in Akan.

[8] According to Saah (2004:52), the expression *dè àbùfúó* occurs in an instrumental SVC which relates the manner in which an action is carried out.

[9] Unless otherwise specified, the term "causative" as used in the rest of this chapter refers specifically to analytic causatives.

[10] The earliest reference to the alternation in the coding of the causee argument in analytic causatives can be dated back to Christaller (1875:105) who noted that in Akyem (a Twi dialect), "the subject of the principal verb is made the object of the auxiliary verb *ma*" in the causative.

[11] The term "clausal determiner" (CD), as far as I know, was first used with regard to Akan by Saah (1994:104).

[12] Interestingly, however, the 'no' causative allows for the same mixed aspects (PERF-PROG) found in SVCs in Akan, as shown in (3a-b).

(3)a. Kofi á-mà nó-ò kɔ́ fíé
Kofi PERF 3SGOBJ-PROG go home
Kofi has caused it that he is going home.

b. Ama á-fà ǹnwómá nó-ò kèǹkáń
Ama PERF-take book DET-PROG read
Ama has taken the book and she is reading it.

[13] Campbell (1998:53) argues that "the causative verb *má* 'make' takes an IP complement" but "unlike full clausal complement, where an overt complementizer is usually required, no complementizer is possible in the causative construction." It can be noted, however, that the complement clause in the causative is much smaller than an IP especially in the case of the object marked causee. When the causative has an object marked causee, the complement clause is totally dependent on the tense/aspect and negation of the matrix predicate which implies that the embedded predicate does not project its own Inflectional head, contra Campbell (1998:56, ex. 17).

[14] I am grateful to Abigail Ayiglo and Rashida for providing me with these Ewe examples.

[15] Many thanks to Akua Agyei-Owusu and Sampson Korsah for providing me with these Ga examples.

[16] I am grateful to Mrs. Patience Asare for providing this example.

[17] The non-implicative complementizer is realised as *sέ* in the Twi dialects (Asante, Akuapem, Akyem) but as *dέ* in Fante.

[18] Raising has been identified as one of the behavioral properties of subjects in Akan. According to Osam (1994a:160), "in a construction with an embedded complement clause… the subject of the lower clause can be raised to become the object of the matrix clause." It can be observed in (4a) and (5a) that Esi/Ama is the subject of the complement clause but in (4b) and (5b) the subject of the complement clause (Esi/Ama) seems to have been raised from the subject position to become the direct object of the verb in the matrix clause.

(4)a. Kofi hù-ù sɛ́ Esi rè-twé àbòfrá nó
Kofi see-COMPL COMP Esi PROG-pull child DEF
Kofi saw that Esi was pulling the child. (Osam 1994a:160, ex. 22a)

b. Kofi hù-ù Esi sɛ́ ɔ̀-rè-twé àbòfrá nó
Kofi see-COMPL Esi COMP 3SGSUBJ-PROG-pull child DEF
Kofi saw Esi pulling the child. (Osam 1994a: 160, ex. 22b)

(5)a. Pàpá nó hyè-è sɛ́ Ama ń-ná ǹtɛ́ḿ
man DET order-COMPL COMP Ama IMP-sleep early
The man ordered that Ama sleeps early.

b. Pàpá nó hyè-è Ama sɛ́ ɔ́-ń-ná ǹtɛ́ḿ
man DET force-COMPL Ama COMP 3SGSUBJ-IMP-sleep early
The man ordered Ama that she should sleep early.

Saah (1994), however, argues that (4b) and (5b) do not involve movement of the subject of the complement clause to the object position of the matrix verb rather, the occurrence of the resumptive pronoun shows that they are base-generated. According to Saah (1994:88), the "resumptive pronouns are base-generated and coindexed with constituents occurring in A'-position" and are not offending trace(s) of a moved element.

Furthermore, the (a) and (b) versions of (4-5) correspond to a semantic difference. In the (a) versions, the subject of the complement clause (Esi/Ama) is not acted on directly but in the (b) versions the erstwhile subject of the complement clause is directly affected by the action described by the matrix verb. Thus, when a manipulative verb is used in these sentences, the sentences yield direct manipulation and non-direct manipulation meanings respectively. Consequently, the different positions that the (erstwhile) subject NP of the complement clause occupies in the sentence seem to be motivated by specific semantic principles involving direct and indirect manipulation. In the causative, however, the object and subject marked causee have essentially the same meaning.

[19] The idea of symmetric sharing of an argument in an SVC was proposed by Hiraiwa and Bodomo (2008). In their analysis of SVCs in Dagaare, Hiraiwa and Bodomo (2008) show that in Dagaare, the object may form a syntactic constituent with either the initial verb (6a) or the non-initial verb (6b) or both (6c).

(6)a. Nɛ́nè sɛ́ɛ́ó lá ká ó sɛ́ ɔ̀ɔ̀
meat roast.NML F C 3SG roast eat
It is roasting the meat that he roasted and ate (Hiraiwa and Bodomo 2008:247).

b. Nɛ́nè ɔ́ɔ́ó lá ká ó sɛ́ ɔ̀ɔ̀
meat eat.NML F C 3SG roast eat
It is eating the meat that he roasted and ate (Hiraiwa and Bodomo 2008:247).

c. Nɛ́nè sɛ́-ɔ́ɔ́ó lá ká ó sɛ́ ɔ̀ɔ̀
meat roast-eat.NML F C 3SG roast eat
It is roasting meat and eating it that he roasted and ate (Hiraiwa and Bodomo 2008:247).

Thus, they conclude that in this type of Dagaare SVC the object is "structurally shared" by both verbs in a symmetrical fashion (Hiraiwa and Bodomo 2008:248).

[20] Even though in Akan inanimate objects are not realized overtly in pronominalization, this is one of the few instances where this condition is set aside. In Akan, when inanimate entities are objects of destruction verbs (also middle verbs; Boadi 1971) they are overtly realized in pronominalization. For more discussion on this, see Saah (1994:36) and Osam (1994a:154).

[21] For a detailed discussion of relativization in Akan, see Saah (1994, 2011).

[22] It must be noted, however, that Osam (1994a:162) identifies certain (di)transitive verbs (kyèrɛ̀ 'show, teach', bìsà 'ask') whose Theme NP objects may be relativized or focused in sentences. Accordingly, Osam (1994a:176) refers to Theme NPs of such verbs as Secondary Direct Object. See also, Dryer (1986) and Bresnan and Moshi (1990).

CHAPTER FIVE

FORCE DYNAMICS AND THE SEMANTICS OF CAUSATIVES

1.0 INTRODUCTION

This chapter presents the semantics of causative expressions in Akan through the Force-Dynamics framework (Talmy 1988, 2000). Section 2 presents the properties of participants and events in causative expressions in Akan. In section 3, I identify five major event types of causation expressed in Akan namely, MANIPULATION, TRIGGER, PROMPT, CREATE and ALLOW. Three of the five event types, MANIPULATION, TRIGGER and PROMPT were originally proposed by Stefanowitsch (2001) and this study proposes two additional event types of causation namely, CREATE and ALLOW. It will be demonstrated that each of the event types has distinct semantic properties and pattern(s) of causation which can be properly represented through the Force-Dynamics framework. In section 4, I examine the notion of direct and indirect causation and how these might be encoded in the event types of causation. A summary of the discussion is presented in section 5.

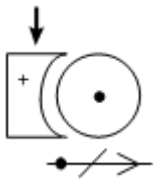
2.0 THE CAUSATIVE SITUATION

As pointed out in chapter three, causation involves the expression of force opposition between two entities or bodies. As set out by Talmy (2000), the interaction between bodies may involve exertion of force or removal of force by one entity from the other. In the instance of exertion of force, causation is said to

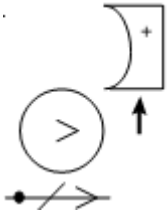
have occurred when a stronger entity (ANT) acts on a weaker entity (AGO) *causing* the latter to change its original state or action. On the other hand, a stronger entity (ANT) who hitherto had restrained another entity (AGO) from displaying its state or action may, over time, give way; thus *allowing* the latter to continue manifesting its original state or action (see Fig 5.1).

Figure 5.1. *Causative paradigm* (Talmy 2000:418, 420)

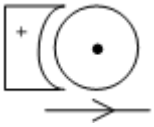
a. *onset causation*



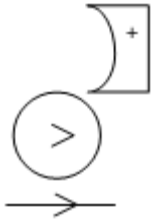
b. *onset letting*



c. *extended causation*



d. *extended letting*



As illustrated in Fig 5.1, there are two main ways in which force may be applied or removed by a causer from a causee in the causative situation. In causation, a stronger causer may suddenly apply force on a weaker causee causing the latter to perform an action which is different from its original state or action (*onset causation*, 5.1(a)). Alternatively, a causer may maintain its stronger force exertion on the causee for the duration of the entire causative event (*extended causation*, 5.1(c)). Similarly, in letting, a stronger causer may suddenly refrain from blocking a causee, allowing the causee to manifest its original state (*onset letting*, 5.1(b)).

Again, a causer may remain away, over time, from blocking a causee with its stronger force (*extended letting*, 5.1(d)).

The different force-dynamic patterns presented in Fig 5.1 may be illustrated in the causatives sentences below.

(1)a. Yaw bɔ̀-ɔ̀ tòá nó
Yaw break-COMPL bottle DET
Yaw broke the bottle.

b. Kofi pĭá-à Ama hwè-è fámɁ
Kofi push-COMPL Ama fall-COMPL down
Kofi pushed Ama to the ground.

c. Papa nó mà-à àbɔ̀frá nó kɔ̀-ɔ̀ fĭé
man DET CAUS-COMPL child DET go-COMPL home
(i) The man made the child go home.
(ii) The man let the child go home.

In the lexical causative in (1a), the bottle which may be at rest is suddenly acted upon by a stronger agent (Yaw) resulting in the change of state of the bottle. Similarly, in the cause-effect SVC in (1b), a stronger agent (Kofi) suddenly applies some amount of force on Ama which results in her falling down. Thus, the lexical and cause-effect SVC both illustrate onset causation where a stronger causer suddenly initiates or performs an action on a weaker causee resulting in the causee undergoing a change of state.

Analytic causatives, on the other hand, may express a variety of force-dynamic patterns depending on the context of the interaction. As shown in (1c), the analytic causative may involve a situation where a stronger causer acts (physically or otherwise) on a weaker causee and causes it to undergo a change of state. Alternatively, the same construction could involve a situation where a stronger causer disengages from a weaker causee allowing the causee to manifest its original state or intended action. The different force-dynamic patterns expressed in (1c), however, involve similar expenditure of force in that in both cases, the causer acts suddenly on another entity but the exertion of force or removal of force by the causer may or may not last the entire duration of the causative event. For instance, in (1c), the man could have simply instructed the child to go home which the child complied or he could have walked with the child to make sure that he did get home (see section 3.1). Thus, (1c) may involve either onset or extended causation (or letting) depending on the context of the interaction.

2.1 Properties of Causation

Generally, causation is expressed in events involving entities and a perceived causal relationship between the entities (and their actions or reactions). Thus, each of the elements in the interaction may be differentiated from the other and their precise nature and properties distinguished. Similarly, the nature of the causal relation can be characterized, albeit this may not always be specified by the construction but may follow from our knowledge on causal reasoning. The goal of this section, therefore, is to isolate some recurring features of the causative

situation with regard to force entities, patterns of causation, and nature of causing and caused events.

2.1.1 Force Entities (ANT and AGO)

Causation involves force interaction between (at least) two force entities: a causer (ANT) and a causee (AGO). Let us first consider some properties of the causer.

(a) *Causer* (ANT)

In many causative expressions, the causer is an animate (sentient) entity who acts on another entity to bring about a certain result (2a-b).

(2)a. Ama bù-ù àkònwá nó
Ama break-COMPL chair DET
Ama broke the chair.

b. Kofi mà-à Ama bù-ù àkònwá nó
Kofi CAUS-COMPL Ama break-COMPL chair DET
(i) Kofi made Ama break the chair.
(ii) Kofi had the chair broken by Ama.

The action of the causer may be intentional or non-intentional when it is an animate entity. For instance, in (2a), Ama may intentionally carry out an action to break the chair. Likewise, in (2b), the action of the causer, Kofi, may be intentional. However, in (2b), there may be more than one target for the intention of the causer: either Kofi may intend Ama (and not someone else) to break the chair or he may intend for the chair to be broken but gets Ama to perform this action. However, it can be noted that intentionality of the causer is not specified as

part of the construction but may only be inferred from contextual information. This can be seen from the fact that a conjunct clause may be appended to (2a) to eliminate any intentional meaning of the action of the causer's action (3).

(3). Ama bù-ù àkònwá nó nàńsó w-à-ǹ-hyɛ́dá
Ama break-COMPL chair DET but 3SG-PERF-NEG-intend
Ama broke the chair, but she did not intend it.

It is possible, however, for the causer to be an inanimate entity which is not capable of volition or intentionality. Inanimate causers may include natural forces (wind, sun), projectiles (stone, bullet) and instruments (knife, gun) (Wolff et al. 2010:186-187). According to Wolff et al. (2010:189, italics in original) "an entity can appear as [causer] in English and other languages if it acts as a *force creator*" either by converting energy, physical contact or force redirection. Consider the causer entity in the following sentences in (4a-b).

(4)a. Mfràmá nó wòsó-è dùá nó
wind DET shake-COMPL tree DET
The wind shook the tree.

b. Awìá nó mà-à ǹtààdɛ́ɛ́ nó wò-ò ǹtɛ́ḿ
sun DET cause-COMPL clothes DET dry-COMPL quickly
The sun caused the clothes to dry quickly.

As (4a-b) illustrates, wind and sun may act as causer because they are able to generate an amount of energy of their own and thus resemble (intentional) animate agents. In other words, inanimate objects which create their own kinetic energy (or

are at least perceived to do so) are metaphorically considered agentlike and may therefore be expressed as causer.[1]

Thus, the causer in the causative may be identified as an animate or inanimate entity with the latter construed as agentlike because of the ability to create force. Still, it is vital that we explicate the notion of agency attributed to animate and inanimate causers here. In fact, the idea of agency seems to be more appropriate to animate and not inanimate causers because even though inanimate entities may create their own force they lack volition and intentionality in this process. On the other hand, animate objects may volitionally initiate force in an interaction. Thus, Talmy (2000) notes that

> The notion of **Agent** is criterially characterizable as an entity with body (parts), volition, *and* intention, where the body parts respond to volition, and intention applies to these responses and, optionally, to further consequent events … A sentient entity represented as the subject of a syntactically causative construction can either intend the final caused event or not, and this difference distinguishes the semantic concept of 'Agent' from that of 'Author' (Talmy 2000:513-514, emphasis in original).

In other words, while it is possible to say that Ama and Kofi in (2a-b) may have intended the caused event it is impossible to think that the sun decided to shine so that someone's clothing would dry quickly or the wind blew with the intention of shaking the tree. For this reason, in this discussion, we would hold the notion of intentionality (+/-int.) as a distinction between animate and inanimate causers and refer to the former as Agents and the latter as Authors.[2]

It is also possible to have an event rather than an entity as a causer in a causative expression. Consider the examples in (5a-c) below.

(5)a. Àn̆ìdàsòɔ́ à ɛ́-mɔ́-má mú ǹtɛ́mɔ́ mà àkòmá yàré
expectation REL 3SG-NEG-come inside quickly CAUS heart sick
Expectation postponed is making the heart sick (Proverbs 13:12, Asante Bible).

b. Mmùàèɛ́ bɔkɔɔ̀ mà àbùfúó twá
answer slow CAUS anger cease
A mild answer causes anger to cease (Proverbs 15:1, Asante Bible).

c. Àníhá mà òbí dá hàtèè, ɔkwàdwòfóɔ́ krá dì kɔ́mɔ́
laziness CAUS someone sleep deep lazy person soul eat hunger
Laziness causes someone to sleep deep, a lazy person's soul goes hungry (Proverb 19:15, Asante Bible).

In (5a-c), the causer though inanimate is not just an object but an event. In all these examples, expectation, mild answer and laziness are events which are expressed as bringing about a change of state in another entity in the sentence. We know, however, from our experience in the real world that such events do not initiate any amount of force by themselves nor do they have the intention to effect a change in an entity, albeit they are expressed as altering the state of an entity. In this sense, events may appropriately be identified as Authors because they do not occur on their own volition neither do they have the capacity to intend the caused event. Nevertheless, it is understood that events which act as causers may be initiated by an intentional or unintentional agent which is usually gapped in the causative expression.

Thus, we can distinguish between different types of causers: (a) Agent, volitional/intentional causer (+int.) and (b) Author, non-volitional/unintentional causer (-int.). However, as we can see in Fig 5.2, for causation to occur, the causer, whether volitional or not, is construed as possessing or displaying greater force (>f) than the causee in the interaction.

Figure 5.2. ***Types of causers*** **(based on Talmy 2000:415)**

a. *agent* (*animate*) b. *author* (*inanimate*)

(b) ***Causee*** **(AGO)**

The causee (AGO) in causation is the entity whose original state or action is overcome by a stronger entity (the ANT) thereby causing it to manifest a different state or action over time. For causation to occur the causee's strength must be construed as weaker than that of the causer; the difference in the balance of strengths between the causer and causee during the interaction determines whether or not causation is successful. Dixon (2000:62) isolates the following parameters in describing the causee: (a) it may retain a degree of control or have no control in undergoing the caused event; (b) it may act willingly or unwillingly; (c) it may be partially affected or completely affected. As Givon (2001:45) observes, the less control a causee exercises in the interaction, the more successful the manipulation of the causee by the causer would be.

Consider the following examples in (6a-c).

(6)a. Àwĭá nó mà-à ǹsúó nó wè-èɛ̀
sun DET CAUS-COMPL river DET dry-COMPL
The sun caused the river to dry up.

b. Tĭkyànĭ nó mà-à m̀-mɔ́frá nó twèré-è
teacher DET CAUS-COMPL PL-child DET write-COMPL
ǹsɔ́hwɛ́ nó ànɔ̀pà yí
exams DET morning this
The teacher made the children write the exams this morning.

c. Mààmé nó mà-à àbɔ́frá nó sù-ì
woman DET CAUS-COMPL child DET cry-COMPL
The woman made the child cry.

It can be observed from (6a) that the causee (river) is an inanimate entity whose original state (that is, being filled with a certain amount of water) undergoes a change by evaporation from the intense heat from the sun (causer). Here, the river (causee) does not resist the force of the sun (perhaps by somehow trying to prevent evaporation of its content by the heat emitted by the sun); rather it is totally affected by the impact of the sun's action. In fact, because inanimate entities do not have volition or intentionality they are not compatible with the notion of retention of control but seem to be totally affected entities in causation.[3]

The situation is quite different, however, when the causee is animate. In many cases, as in (6b-c), an animate causee may retain an amount of control even though their original state may be overturned by a stronger entity. For instance, in (6b), no matter the effort on the part of the teacher, each student must decide whether or

not to write the exam. Consequently, the causee in (6b) may act willfully to bring about the resultant action. Similarly, in (6c), the causee may maintain a degree of control in manifesting the resultant state; the woman may have asked the child to cry which the child complied. In other words, the caused event in (6c) may be voluntary. It is also possible, however, that in (6c) the causee undergoes the emotional state of crying when he perceives an event in connection with the causer (the woman).

Thus far, it has been shown that an inanimate causee is totally affected during causation and may not offer any resistance via reinforced energy (6a), albeit this is not physically (or mechanically) impossible. Accordingly, as illustrated in Fig 5.3(a) an inanimate causee is indicated as having no control (-cont.) over the caused event. However, for animate entities, the causee's resultant state may or may not involve retention of a degree of control in bringing about the caused event (5.3b). Nevertheless, where an animate entity does not retain control over the caused event, for the avoidance of confusion, the causee is indicated as animate (+anim.)

Figure 5.3. ***Types of causee*** **(based on Talmy 2000:434)**

a. *inanimate causee*

b. *animate causee*

(c) ***Causing vs. Caused Events***

Basically, causation is a relation between two micro-events namely, causing and caused events. However, there are different ways in which the causing and caused events may be overtly expressed in a causative sentence (7a-c).

(7)a. Yaw pàé-è bɔ́ɔ̀lò nó
Yaw burst-COMPL ball DET
Yaw burst the ball.

b. Kwame sùm̀-m̀ Ama hwè-è fáḿ
Kwame push-COMPL Ama fall-COMPL down
Kwame pushed Ama and she fell down.

c. Kwame mà-à Ama hwè-è fáḿ
Kwame CAUS-COMPL Ama fall-COMPL down
Kwame caused Ama to fall down.

In a lexical causative (7a), the causing and caused events are not independently expressed but are conveyed in a single predicate. However, in a cause-effect SVC (7b), the causing and caused events are overtly expressed by different predicates. As noted by Durie (1997:330), in cause-effect SVCs, "verbs are ordered according to the direction of causation expressed in the conceptual structure of the verb complex." Thus, in Akan, the causing event is iconically expressed before the caused event reflecting the temporal sequence between the two events. On the other hand, analytic causatives, like a cause-effect SVC, express causing and caused events in two separate predicates. However, analytic causatives overtly express only the caused event while leaving the causing event unspecified (7c). Thus in (7c), the causative verb *má* does not express any specific activity as

constituting the causing event rather, it only conveys the abstract notion of causation.

According to Talmy (2000:481), in causation the "cause of the simple event is itself also a simple event rather than, for instance, a (physical) object" in the sentence. In other words, even though the causing and caused events in the causative may be expressed simply as a relation between entities (a causer and a causee) this representation can be considered only as an abbreviation of the two events. For instance, the action of an animate causer begins with psychogenic processes which result in the brain sending messages in synapses to body parts such as the limbs or organs of speech (in the case of directive causation) which animates the causer to carry out any action which might affect another entity (see Talmy 2000:433-434). Similarly, even though the caused event is usually represented in language as a causee who undergoes the action described by the predicate of effect, this is hardly a simple event. A causee must be able to perceive the force quantity exerted by a causer and given the nature of the causee it would then react to the perceived force. For instance, in the case of directive causation where a causee receives verbal instructions from a causer the causee must initiate its own energy in the way that a causer does in order for it to perform the action which has been requested by the causer. Thus, although causing and caused events may involve several complex neural and/or mechanical actions, languages tend to abstract from this complex system of activities a central process or entity and foreground it in a causative expression.

3.0 EVENT TYPES OF CAUSATIVES

In this section, we will discuss the major event types of causation which may be expressed in Akan causatives. It is proposed that causative expressions in Akan display five major event types of causation namely, MANIPULATION, TRIGGER, PROMPT, CREATE and ALLOW. It will be shown that each configuration type of the causative has specific semantic properties which identify it as a major semantic type. Three of the event types examined here (MANIPULATION, TRIGGER, PROMPT) are based on Stefanowitsch (2001).

3.1 MANIPULATION Event Type

In this type of causation "an animate causer X intentionally acts on a causee Y in order to influence Y in such a way that Y performs an action Z that is under Y's control" (Stefanowitsch 2001:96).

Consider the examples in (8) below.

(8)a. Kofi kùm̀-m̀ àpɔ̀ǹkyé nó
Kofi kill-COMPL goat DET
Kofi killed the goat.

b. Opoku sùm̀-m̀ Yaw tò-ò fáḿ
Opoku push-COMPL Yaw put-COMPL down
Opoku pushed Yaw to the ground.

c. Mfràmá nó tùtú-ù ǹ-nùá nó gù-ù fáḿ
wind DET uproot.RED-COMPL PL-tree DET lie-COMPL down
The wind blew the trees down.

The MANIPULATION configuration is aptly demonstrated in lexical causatives and cause-effect SVCs. In (8a), an animate causer acts on an animate causee and because of the latter's stronger force he overturns the causee's state and brings about its death. This direct exertion of force is initiated and controlled by the causer and even though the action of the causer may be forcefully resisted by the causee, the causer overpowers the causee because of the difference in the balance of strengths between the two entities. Similarly, in the cause-effect SVC (8b), the stronger (animate) causer initiates an action (pushing) which results in the causee falling down. In (8c), however, the causer is an inanimate entity (wind) whose greater force brings down the trees in its path. Although Stefanowitsch's (2001) definition of the MANIPULATION configuration suggests that the caused event is under the causee's control, this appears not to be the case in lexical causatives and cause-effect SVCs.[4] Rather, for successful manipulation to occur in the lexical causative (8a) and the cause-effect SVC (8b-c), the causee has to be totally affected by the causer's action.

Non-periphrastic causatives inform us more about the kind of force interaction displayed in MANIPULATION. In each of the sentences in (8a-c), there is direct physical contact between the causer and the causee in the interaction. In effect, both the causer and causee must be at the same place and the causing and caused event must share an overlapping spatio-temporal configuration (see Shibatani and Padershi 2002:89-90; Wierzbicka 1975). I will return to this issue when dealing with the distinction between direct and indirect causation in Akan. I will, however,

refer to such manipulation of a causee by a stronger causer as *coercive* MANIPULATION.

The MANIPULATION configuration is also demonstrated in analytic causatives in Akan, as illustrated in (9a-c) below.

(9)a. Ɔkɔm̀fòpányíń yí **mà**-à Yaw Sɛbɛ sà-à
chief priest this **CAUS**-COMPL Yaw Sɛbɛ fetch-COMPL

hy̆ìré nó kàkrá pèté-è bòdúà[5] nó só
white clay DET little sprinkle-COMPL cow tail DET top
This chief priest made Yaw Sɛbɛ fetch a little white clay and sprinkled it on the cow tail (Bamfi-Adomako 1997:33).

b. Ɔ-**mà**-à òdíkùró kyéámé hwĭé-è
3SGSUBJ-**CAUS**-COMPL chief linguist pour-COMPL

m̀mòrɔ̀sá gù-ù mú
liquor spill-COMPL inside
He made the chief's linguist pour the liquor into it (Bamfi-Adomako 1997:33).

c. Àkòrɔ̀má kɔ̀-èé nó, Nàná **mà**-à àhèǹkwàá
hawk go-COMPL when Nana **CAUS**-COMPL steward

kɔ̀-bùé-è Àkókɔ́ â ɔ̀-sá-à nò
go-open-COMPL chicken REL 3SGSUBJ-cure-COMPL 3SGOBJ

yàdéɛ́ nó
disease DET
When Hawk left, Nana made his steward open (the door for) Chicken who cured his disease (Boahene 1997:48).

In (9a), the chief priest gets Yaw Sɛbɛ to perform an action. However, we note that the exact action performed by the chief priest to get Yaw Sɛbɛ to fetch the white clay is not specified in the sentence. We can surmise, however, based on the context, that the chief might have verbally directed Yaw Sɛbɛ to perform the

action and because of the superior authority of the chief priest Yaw Sɛbɛ complies. Likewise, in (9b), the causer's specific action is not overtly expressed, nevertheless, the situation appears to be as in (9a) where the causer verbally instructs the causee to perform an action and because of the latter's superior authority the causee follows through with the request. A similar situation obtains in (9c) where a chief's steward heeds the instructions of the chief and performs the action requested by the chief.

In what sense, then, do the sentences in (9a-c) express the MANIPULATION configuration? It is this: in (9a-c) the causee who is under the 'sphere of influence' of the causer is influenced by the causer to perform the action intended by the causer and because of the causer's superior authority the causee performs the intended action (Stefanowitsch 2001:105). It can be observed, however, the action of the causer in analytic causatives may not be physical and the caused event may be controlled by the causee. In other words, the causative act in the analytic causatives in (9a-c) may involve verbal communication of the intention of the causer to the causee. Even so, in this causative situation the causer does more than simply give out instructions. He may invoke his superior authority which may threaten sanctions or punishment should the causee refuse to undergo the causer's intended action. For instance, in (9a) because the chief priest wields superior authority than the causee, Yaw Sɛbɛ (9a), the latter accedes to the wishes of the causer. Thus, causative expressions such as in (9a-c) involve *directive* MANIPULATION configuration.

There are instances, however, where physical manipulation of the causee by the causer may be coded in analytic causatives, as shown in (10a-b).

(10)a. Kwasi **mà**-à mé tè-è kòkòníwá[6]
Kwasi **CAUS**-COMPL 1SG tear-COMPL hen's eye
Kwasi caused me to hurt my toe.

b. Àkókɔ́ ká kyèrɛ́-ɛ̀ Nànáné nè m̀pánìm̀fóɔ́ nó sɛ́,
chicken say show-COMPL Nana and his elders DET that

ɔ-srɛ́ wɔ́ń wɔ́-ḿ-fá nó ńsíé. Sɛ̀ wɔ-dè
3SGSUBJ-beg 3PL 3PL-OPT-take 3SGOBJ hide if 3PL-take

nó sìé ná hwèè à-ǹ-yɛ̀ nó â
3SGOBJ hide and nothing PERF-NEG-do 3SGOBJ then

ɔ-bɛ́-**má** Nànáání á-tè.
3SGOBJ-FUT-**CAUS** Nana eyes CONS-open
Chicken told Nana and his elders that they should hide him. If they are able to hide him and nothing happens to him he will cause Nana's eyes to open, i.e. he will cure Nana's blindness (Boahene 1997:44).

In (10a), the causer performs an action which results in the causee hurting his toe. The context for this sentence could be a situation where Kwasi pushes the causee and the causee hits his toe against a stone resulting in his injury. Also, in (10b), Chicken promises to cure Nana's blindness if he is hidden away from the reach of the Hawk. The story continues that the Chicken, after he is protected by Nana and his elders, flies and touches Nana's eyes causing his eyes to open thereby restoring Nana's sight (Boahene 1997:46). Thus, even though the analytic causative may typically involve non-physical action of the causer on the causee, the use of direct physical force by a causer on a causee to bring about a caused event is not incompatible with this construction.

We can sum up the discussion on the MANIPULATION event type by adjusting Stefanowitsch's (2001:96) definition as follows: a stronger causer X through physical or non-physical force acts on a causee Y such that the causee Y performs an action or undergoes a state Z which may or may not be under his control. The different properties of coercive and directive MANIPULATION can be summarized in (11) below.

(11). *Properties of* MANIPULATION

a. *Coercive* MANIPULATION

- ✓ animate/inanimate causer
- ✓ animate/inanimate causee
- ✓ causer possesses stronger force quantity
- ✓ causee is under control of causer and is totally affected
- ✓ direct contact between causer and causee
- ✓ causer applies physical force on causee

b. *Directive* MANIPULATION

- ✓ animate causer
- ✓ animate causee
- ✓ causer's stronger force consist of social authority or influence rather than physical force
- ✓ causee is not totally affected, but controls the caused event
- ✓ no direct contact between causer and causee
- ✓ causee complies because of perceived sanctions or benefits
- ✓ causer's action is verbal (instruction or directive) rather than physical force

The variant force-dynamic patterns and properties of the MANIPULATION configuration have been diagrammed in Fig 5.4.

Figure 5.4. ***Force-dynamics of*** **MANIPULATION**

a. *coercive* MANIPULATION b. *directive* MANIPULATION

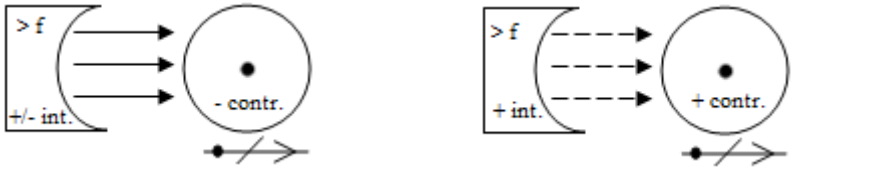


Fig 5.4(a-b) shows that in both coercive and directive MANIPULATION a causer with greater force (>f) overcomes the state of a causee. The continuous arrows in (5.4a) represent the use of physical force (direct contact) by the causer on a causee in coercive MANIPULATION while the broken arrows signify non-physical action (non-direct contact) of the causer on the causee in directive MANIPULATION. As noted already in this section, lexical causatives and cause-effect SVCs typically express physical exertion of force by a causer on a causee. Analytic causatives, on the other hand, may express the causer's action as involving either physical or non-physical contact. This is not surprising given the fact that the analytic causative morpheme is not explicit on the specific nature of the causing event and this open relation may go either way in expressing physical or non-physical exertion of force.

The second pattern which emerged from the MANIPULATION configuration is that wherever the causer's action involves physical contact the caused event cannot be under the control of the causee, as shown by the (- contr.) feature of the causee in Fig 5.4(a). Alternatively, the resulting event seems to be under the control of the causee (+contr.) if the causing event involves non-physical force by the causer on

the causee such as a communicative act 5.4(b). Again, as represented in 5.4(a-b) MANIPULATION may involve intentional or unintentional causers. It appears that intentionality is a requirement only in the case of a causer who merely verbally instructs a causee to perform a certain action (5.4b). However, since both animate and inanimate objects can act as causers in coercive MANIPULATION, intentionality may go either way (5.4a).

Thus, the MANIPULATION configuration may be expressed in a range of causative forms which share a common meaning of causation where a causer brings about a physical reaction in a causee through physical or non-physical force.

3.2 TRIGGER Event Type

Another event type of causation found in causative expressions in Akan can be referred to as the TRIGGER event type. Stefanowitsch (2001:97) sets out the TRIGGER event type as involving the following: "a causer-event X occurs (which may or may not have an intentional agent); X influences a causee Y in such a way that given the nature of Y, Y will undergo a process Z." Thus, the TRIGGER configuration involves a situation where an event (rather than an agent) triggers an involuntary reaction in a causee. The following examples illustrate this force-dynamic pattern.

(12)a. Àbáń mú dá ń-yɛ́ àdèpá àm̀pá. Ɛ̀-tùmî
prison inside sleep NEG-be good thing truly. 3SGSUBJ.INA-can

sɛ̀é àbèráńtéɛ́. Ɛ̀-**mà** àbèráńtéɛ́ bɔ́ àkòrà
destroy young man 3SGSUBJ.INA-**CAUS** young man hit old man

mónó.
immature
Doing time in prison is truly not a good thing. It can destroy a young man. It causes a young man to become an old man prematurely (Bamfi-Adomako 1997:86).

b. Ònípá kómà mú àwèrɛ̀hɔ́ɔ́ bòtó nó, nà àsɛ̀m̀pá
person heart inside sadness bow down 3SGOBJ and good word

mà è-dí àhùrìsí
CAUS 3SGSUBJ-eat rejoicing
Anxious care in the heart of a man is what will cause it to bow down, but the good word is what makes it rejoice (Proverbs 12: 25, Asante Bible).

c. Àníhá **mà** òbî dá hàtèè, ɔ̀kwàdwòfɔ́ɔ́ krá dî kɔ́ḿ
laziness **CAUS** someone sleep deep lazy person soul eat hunger
Laziness causes someone to sleep deep, a lazy person's soul goes hungry (Provers 19:15, Asante Bible).

d. Ɔ̀bà kwàsèá hyɛ́ né pàpá àhòmètéw; nà
child stupid put 3SGPOSS father vexation and

ɔ̀-**mà** né màámé dî àwèrɛ̀hɔ́ɔ́
3SGSUBJ- **CAUS** 3SGPOSS mother eat sadness.
A stupid son is a vexation to his father and bitterness to her mother, i.e. A stupid son causes her mother to experience bitterness (Proverbs 17:25, Asante Bible).

In (12a), the causer is not an entity but rather an event (doing time in jail) which causes a young man to age prematurely. The first part of the sentence in (12b) involves a lexical causative which expresses a condition of the heart (anxious care) as causing a person to become sad or bowed down; the second part of (12b) involves an analytic causative with an event (the hearing of a good word) as something which causes a person to rejoice. Similarly, in (12c), laziness is seen as

causing a person to sleep deeply. In (12d), however, an agent causer is expressed as causing his mother bitterness. Even so, we know that in reality it is the actions associated with the child's stupidity which cause the mother bitterness and not the child per se. Thus, the examples in (12a-d) have the following common properties which identify them as involving a particular event type of causation: (a) the causer is not an agent but rather an event; (b) an animate causee perceives the causing event as a stimulus; (c) the causing event triggers an involuntary (re)action in the animate causee.

The term TRIGGER used here reflects the impact of the causer's action on the causee in this event type of causation. As observed in (12a-d), the interaction between the causer and the causee in the TRIGGER configuration is not physical, but rather psychological. Since the causer is an event, it may be distant in time and space from the causee. This makes the causal link between the causer and the causee more metaphorical or abstract than physical. It can even be said that the success of causation in this configuration depends on the ability of the causee to perceive the causing event. This parameter is important in defining the TRIGGER category in that only an animate causee appears in this semantic class; the examples in (12a-d) illustrate that the causee must be capable of undergoing an emotional or psychological change of state.

In this vein, (12b) is interesting. Consider a parallel example in (13).

(13). Ànǐdàsòɔ́ à é-mí-má mú ǹtɛ́mí **mà** àkòmá yàré
expectation REL 3SG-NEG-come inside quickly **CAUS** heart sick
Expectation postponed is making the heart sick (Proverbs 13:12, Asante Bible).

In (13), the heart is said to undergo an involuntary action of becoming sick due to unrealized expectations. This construction exploits a BODY-PART metaphor which represents the sadness of a person as issuing from the heart being sick (see Ayiglo 2010). Thus, metaphorically, the causee in this sentence is expressed as the heart which undergoes a change of state when it perceives the postponement of an expectation. Although the heart is not a person, it is capable of undergoing an emotional state; indeed, human emotions are metaphorically thought to spring out of the heart. Thus, heart here is used to represent the whole person.

As demonstrated above, in the TRIGGER configuration the causee undergoes an involuntary action which may be psychological or emotional upon perceiving an event which may act as a stimulus or trigger. There is, however, a set of constructions which presents some additional properties of the TRIGGER configuration. Consider the following examples in (14).

(14)a. Dèè è-bá-àɛ́ né sɛ́, né pàpá
what 3SGSUBJ.INA-come-COMPL be that 3SGPOSS father
ábúsùàfóɔ́ kɔ̀-ɔ̀ àbísá mà-à ɔ̀kɔ̀mfóɔ́ nó
familiy go-COMPL ask CONSE-COMPL priest DET

ká kyèrɛ́-è wɔ̀n sɛ́, è-yè ɔ̀nó
say show-COMPL 3PL that 3SGSUBJ.INA-be 3SGOBJ

Abosi nà ɔ̀-yɛ́-è sáà ádèè nò, èfìrì
Abosi FOC 3SGSUBJ-do-COMPL that thing DET because

sé ɔ-yɛ̀ ɔbàyìfó. Sáà àsém nó **mà**-à
that 3SGSUBJ-be wizard that matter DET **CAUS**-COMPL

Abosi bɛ̀-yɛ́-ɛ̀ ɔtámfó wɔ̀ kùró nó mú.
Abosi come-be-COMPL enemy in town DET inside
What happened was that his father's family members went to a priest who told them that he is a wizard. This made Abosi become an enemy in the town (Bamfi-Adomako 1997:91).

b. Nhùmú **má** ònípá nyá àdóm
insight **CAUS** person get favour
Insight itself gives favor i.e. insight causes a person to receive favor (Proverbs 13:15, Asante Bible).

c. Àhódé **mà** ònípá nyá ǹ-nàmfó pĩĩ, ná òhĩání dɛ̀ɛ̀,
riches **CAUS** person get PL-friend many and poor one TOP

nɛ̀ ǹ-námfò mpó twé wɔ̀n hó fí nɛ̀ hó
3SG PL-friend even pull 3PL self from 3SG self
Wealth is what adds many companions, but one that is lowly gets separated even from his companion i.e. wealth causes a person to get many friends but as for the poor one even his friends pull away from him (Proverbs 19:4, Asante Bible).

In (14a), Abosi who hitherto was accepted by the community has become an enemy on suspicion that he used witchcraft to murder his family. Also in (14b), insight is said to cause a person to receive favor and in (14c) riches causes a person to have many friends. It can be noted that the causer in (14a-c) is an event rather than an agent. In each of these examples, there is an entity that appears to be affected by the event causer and thus resembles a causee. However, this resemblance is only superficial. In fact, each of the entities which occupy the position of the causee in (14a-c) is not a true causee but is a *pseudo causee* (see Stefanowitsch 2001:116-118).

It may be recalled that in our definition of the TRIGGER event type of causation the causee undergoes an involuntary action given its nature upon perceiving the causing event. However, in (14a-c) the entity which occupies the position of the causee argument does not undergo any involuntary emotional action. For instance, in (14a), Abosi does not turn into an enemy by himself; in (14b), a person does not give himself favor; and in (14c), it is not the wealthy person who seeks the friendship of people. In fact, in this type of TRIGGER configuration the argument which occupies the causee position is really an affectee and not a causee (see Givon 1975:76-75). Accordingly, we can reformulate (14a-c) as (15a-c) to reveal the real causee entity.

(15)a. Sáà àsɛ́ḿ nó **mà**-à ǹ-nípá pìì
that matter DET **CAUS**-COMPL PL-person many

bù-ù Abosi sɛ́ ɔ̀-yɛ́ ɔ̀táḿfó
measure-COMPL Abosi that 3SGSUBJ-be enemy

wɔ̀ kùró nó mú.
in town DET inside
That issue caused a lot of people to think of Abosi as an enemy in the town.

b. Nhùmú **má** ònípá pɛ́ né yɔ́ńkó ásɛ́ḿ
insight **CAUS** person like 3SGPOSS fellow matter
Insight causes a person to like his fellow.

c. Àhódé **mà** ǹ-nípá pîi pɛ̀ sɛ́ wɔ̀ yɛ́ w'àdáḿfó
riches **CAUS** PL-person many like that 3PL be 2POSS.friend
Riches cause a lot of people to want to be your friend.

In (15a), the causing event (the death of Abosi's parents) triggers a psychological reaction in the minds of the people so that they come to view Abosi as an enemy; Abosi is the affectee who suffers the indignation of the people in the town.

Similarly, in (15b), the display of insight by someone causes onlookers to view the one with insight in a more favorable light. Likewise, in (15c), wealth is expressed as causing many people to become friendly with the one who has such material possessions. The sentences in (15a-c) show that where we can tease out the real causee the pseudo causee goes into the affectee argument position from where it originates.

The TRIGGER event type of causation thus involves the following properties (16).

(16). *Properties of* TRIGGER

- ✓ causer is an event rather than an agent
- ✓ animate causee
- ✓ causee perceives causing event as stimulus
- ✓ there is no physical contact between causing event and causee
- ✓ causing event triggers an involuntary reaction in causee
- ✓ causee does not control the caused state; it is totally affected

Figure 5.5. *Force-dynamics of* TRIGGER

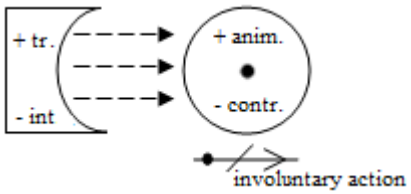


Fig 5.5 illustrates that animate entities are more likely to be the causee in the TRIGGER configuration because they must be able to perceive the causing event and its associated trigger (+tr.) component to undergo an involuntary action. As

before, the broken arrows represent the non-physical interaction between the causing event and the causee in bringing about the caused event in the TRIGGER configuration.

3.3 PROMPT Event Type

Causative expressions in Akan may involve yet another pattern of causation namely, the PROMPT event type. According to Stefanowitsch (2001:97), the PROMPT configuration involves a situation where "a causer-event X occurs (which may or may not have an intentional agent); a causee Y perceives X and decides to react to X by performing an action Z that is under the Y's control." Accordingly, the PROMPT configuration has been referred to as the "causative of decision" because it involves a causee who voluntarily reacts to a causing event (Stefanowitsch 2001:120). Examples (17a-b) illustrate this event type.

(17)a. Dɛ̀ɛ̀ ɛ̀-**mà**-à ɔ̀máńfóɔ́ nyá-à àdàgyé
what 3SGSUBJ.INA-**CAUS**-COMPL people get-COMPL time

yɛ́-ɛ̀ Brayie àyíé kɛ̀sé né sɛ́, ná n'áséḿ
do-COMPL Brayie funeral great be that and 3SGPOSS.matter

yɛ́ ɔ̀bíárá àwèrɛ̀hóɔ́.
be everyone sad
What made the people set aside time to hold a great funeral for Brayie was that her situation saddened everyone (Bamfi-Adomako 1997:79).

b. Ànígyéɛ́ bèbrèbé yî mè né wó nà
fun a lot this 1SG and 2SG FOC

ɛ́-gyé-ɛ́, àféi dɛ̀ɛ̀ ɛ̀-bà-à
3SGSUBJ-take-COMPL now TOP 3SGSUBJ-come-COMPL

nè sɛ́ń nà mè-frɛ́ wó â wó-ḿ-múá
3SGOBJ how when 1SG-call 2SG when 2SG-NEG-answer

mé yí? Wó-á-**mà** m-à-hú
2SG this 2SG-PERF-**CAUS** 1SG-PERF-see

sɛ́ sɛ̀ɛ́ òwúó né yɛ́ǹ nàm̀
that that death with 3PL walk
We shared all the fun together, but what happened so that you do not answer when I call? You have made me realize that death has been walking with us all this while (excerpt from the song "*Me ne wo di nkra*" by Amakye Dede).

The context for the extract in (17a) is that the husband of Brayie who had died earlier was a good-for-nothing man in the community who had brought shame and disgrace to Brayie and the entire family. Naturally, not many people cared for what happened to members of that family. Furthermore, Brayie's only child was serving a jail term and so had nobody to care for her in the town. Thus, many people in the community recognized Brayie's situation as tragic and this caused them to make time to perform the funeral rites for Brayie when she died. In (17b), the death of a friend causes a person who had hitherto not set his attention on the prevalence and force of death to now recognize the pervasiveness of this enemy. Although in (17b) an agent is overtly expressed as the causer, we know that it is the event of the person's death which actually causes a change of state in the causee.

Thus, the PROMPT event type of causation encodes a situation where an event which is perceived by an animate causee results in the causee voluntarily changing his mental, emotional or psychological state. The PROMPT and TRIGGER configurations are similar in some ways. In both TRIGGER and PROMPT, the causer is usually an event acting as a stimulus which causes the causee to undergo a change of state. However, the two event types differ in how the resulting event is

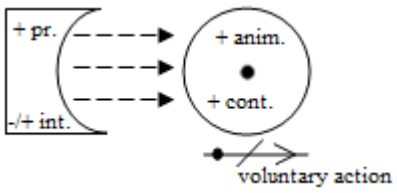
brought about. In the TRIGGER configuration the causee undergoes an involuntary change of state such as a mental, psychological or emotional process. But in PROMPT, the causee is expressed as voluntarily manifesting a change of state upon perceiving the causing event or rather a prompt (+pr.) component of the causer event.

The properties of PROMPT can be summarized as in (18) below.

(18). *Properties of* PROMPT

- ✓ causer is an event/activity rather than an object
- ✓ causee is animate
- ✓ causee perceives causing event as stimulus
- ✓ causing event does not act physically on the causee
- ✓ causing event prompts a causee to undergo a voluntary emotional or psychological state
- ✓ causee controls the caused state; it is not totally affected

Figure 5.6. ***Force-dynamics of*** **PROMPT**



In the PROMPT configuration the causing event is construed as possessing a prompt component (+pr.) which the causee perceives and willingly reacts to (Fig 5.6). Unlike TRIGGER, in PROMPT, the causee retains a degree of control in

performing the caused event and, therefore, the resultant event is characterized as a voluntary action.

Despite the clear semantic difference between the TRIGGER and PROMPT event types of causation there are instances where the two event types may be encoded in the same causative expression. The similarities between the properties of the two configurations may sometimes clash resulting in difficulty in interpretation. Compare the examples in (19a-b).

(19)a. Pàpá nó mà-à àbòfrá nó sù-ĩ
man DET CAUS-COMPL child DET cry
The man caused/made the child cry.

b. Wó-a-mà mè hó á-dwírí mé!
2SG-PERF-CAUS 1SG self PERF-disperse 1SG
You have caused me to be struck with shock!

In (19a), the causing event is expressed as an agent whose action brings about a certain result in another entity. However, (19a) may involve more than one event type of causation. Indeed several interpretations may lend themselves to this sentence; it could be that (a) the child underwent an involuntary action of crying upon perceiving a sad event involving the man; or (b) the man forgot to buy the child some candy and to show his displeasure or protest the child decided to cry; or (c) the man verbally instructed the child to cry and the child proceeded to do so. In other words, (19a) may be used to express three different event types of causation: (a) TRIGGER, (b) PROMPT, (c) directive MANIPULATION depending on context. This is not so with (19b). Thus, even though it is possible for someone to

act surprised or shocked, this context cannot be expressed felicitously in the analytic causative construction in Akan.

It can be observed, however, that the difference in the nature of event types expressed in the causatives in (19a-b) is due to the type of perceptive-cognitive verb used in the sentence. According to Gisborne (2010:6), we may distinguish between three types of perception verbs namely, (a) agentive (b) experiencer/patientive and (c) perceptive; the first two types are relevant to the discussion here. In a clause with an agentive perceptive verb, the only argument of the verb voluntarily (+contr.) initiates and undergoes the action described by the verb (e.g. *hwɛ́* 'to look,' *tìé* 'to listen'). However, with experiencer verbs the only argument of the verb involuntarily (-contr.) undergoes the state described by the verb (e.g. *hɔ́ dwĭrĭ* 'be shocked or surprised,' *bɔ́ hú* 'be afraid, scared,' *hú* 'to see,' *té* 'to hear'). Consider the difference between (20a) and (21b) below.

(20)a. Ama tè-è yɛ̀n ǹkɔ́ḿmɔ́ nó
Ama hear-COMPL 1PL conversation DET
Ama heard our conversation.

b. Ama t̃ié-è yɛ̀n ǹkɔ́ḿmɔ́ nó
Ama listen-COMPL 1PL conversation DET
Ama listened to our conversation.

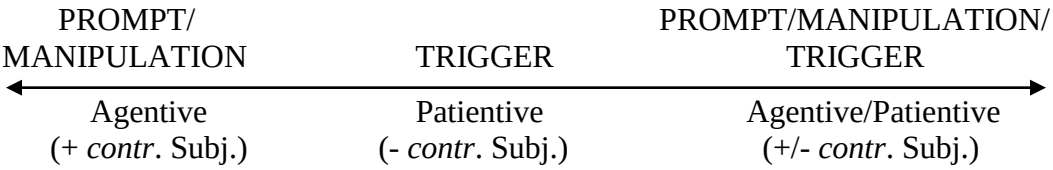
(21)a. Akosua mà-à Ama tè-è yɛ̀n ǹkɔ́ḿmɔ́ nó
Akosua CAUS-COMPL Ama hear-COMPL 1PL conversation DET
Akosua caused it that Ama to heard our conversation.

b. Akosua mà-à Ama t̃ié-è yɛ̀n ǹkɔ́ḿmɔ́ nó
Akosua CAUS-COMPL Ama listen-COMPL1PL conversation DET
Akosua caused/made Ama listen to our conversation.

In (20a), the subject of the sentence, Ama, involuntarily overhears a conversation between two or more people. In (20b), however, the subject Ama initiates a voluntary action, that is, she listens to the conversation. Thus while (20a) involves an experiencer verb whose subject undergoes an involuntary cognitive-perceptive process, (20b) involves an agentive verb whose subject initiates a voluntary cognitive-perceptive action. Likewise, when causativized, the different cognitive-perceptive verbs display different event types (21a-b). In (21a), we have the TRIGGER event type where the causee's action can be described as involuntary. However, in (21b), the caused event is a voluntary cognitive process and, therefore, the sentence may involve either PROMPT (or directive MANIPULATION) both of which require the causee to be in control of the caused event.

The different event type of causation which perception-cognitive verbs may express has been outlined in Fig 5.7. It can be observed in Fig 5.7 that agentive verbs when causativized, may express the PROMPT or MANIPULATION event type. On the other hand, patientive verbs involve the TRIGGER event type while agentive/patientive verbs may express MANIPULATION, PROMPT or TRIGGER.

Figure 5.7. ***Event type(s) of causation in perception-cognitive verbs***



There are two more event types of causation which are expressed in Akan causatives which involve different force-dynamic properties namely, CREATE and ALLOW event types.

3.4 CREATE Event Type

A basic construal of causation involves the CREATE configuration. The CREATE event type of causation may be expressed as involving a causer X who performs an action Z which brings about an entity or event Y. The notion of CREATE constitutes the underlying semantics of some lexical verbs in the language. Consider the force-dynamics expressed in the lexical causatives in (22) below.

(22)a. Asuo nwènè-è kèǹté fɛ̀ɛ̀fɛ́ bí
Asuo weave-COMPL kente beautiful some
Asuo wove a beautiful kente cloth.

b. M̀fitìàsɛ̀ɛ́ nó Ònyàǹkópɔ́ń bɔ̀-ɔ̀ ɔ̀sóròné àsààsé
beginning DET God create-COMPL heaven and earth
In the beginning God created heaven and earth (Genesis 1:1, Asante Bible).

We observe from (22a) that an agent (Asuo) initiates an intricate action (weaving) which results in the creation of an entity (kente cloth) which hitherto was non-existent. Similarly, in (22b), God performs an action (or series of actions) which results in the formation of heaven and earth. Thus, in the CREATE configuration there is no causee entity at the beginning of the interaction; rather, it is the action of the agent which results in the creation of the object which fills the causee slot in the causative expression. As shown in (22a-b), the causer is usually an animate

entity which intends the result(s) of its action namely, the creation of the entity which becomes the causee. The causee in CREATE has no control over the resultant event.

The CREATE event type of causation can also be found in the analytic causative construction. As observed in chapter three, the analytic causative verb in Akan *mά* 'cause, make', is derived from the lexical verb *mά* 'give' through the process of grammaticalization. Thus, causative *mά* is not used lexically to express an "action which creates a new entity as a result" (Moreno 1993:156). However, the idea of CREATE can be expressed periphrastically with the causative verb *mά* and a verb of effect, as shown in (23).

(23). Áféí Ònyànkópɔ́ǹ **mà**-à wíéḿ bá-èɛ̀
then God **CAUS**-COMPL expanse come-COMPL
Then God proceeded to make the expanse i.e. God caused the expanse to appear (Genesis 1:7, Asante Bible).

Example (23), like (22a-b), involves the creation of an entity by a causer with greater amount of energy. In (23), the object which occupies the position of the causee occurs only as a result of the action performed by the causer. Thus, the created entity (the expanse) does not wield any control in the process and is therefore totally affected by the action of the causer. The properties of the CREATE event type has been summarized in (24).

(24). *Properties of* CREATE

- ✓ typically animate causer
- ✓ animate/inanimate causee
- ✓ there is no causee at the beginning of the interaction
- ✓ causer initiates an action which brings the causee into being
- ✓ causee does not control the caused event; it is totally affected by the causer's action

Figure 5.8. *Force-dynamics of* CREATE

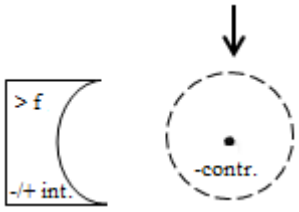


Fig 5.8 shows that in the CREATE event type the causative interaction is not between a causer and a causee where the stronger causer overturns the state of the causee. Thus, unlike in MANIPULATION, there is no representation for a shift in the state of the now created causee. Rather, the result of the causer's action is represented by the downward pointing arrow which shows the newly created entity; the broken circle is intended as shorthand for the newly created entity.

Even though in both CREATE and MANIPULATION a stronger causer acts in a way which directly affects the state of a causee, in the CREATE configuration the causer does not act on a causee as such rather, the causer performs an action which creates the causee itself.

3.5 ALLOW Event Type

Another distinct event type of causation is the ALLOW configuration. It was noted in chapter three that the analytic causative construction is used to express both notions of *causing* and *letting* in the language. In many cases, without context, it is difficult to determine which of these meanings is being expressed in a given causative construction in Akan.[7]

I will adopt Talmy's definition of what constitutes *letting*: "a stronger Antagonist [causer] that has been blocking an Agonist [causee] with a tendency toward motion now disengages and releases the Agonist to manifest its tendency" (Talmy 2000:419). Sentences (25-26) illustrate the ALLOW event type of causation.

(25)a. Kofi gyàé-è ɔkrámáń nó mú
Kofi let.go-COMPL dog DET inside
Kofi let go of the dog.

b. Pàpá pèné-è só mà-à Akosua
father allow-COMPL top RESUL-COMPL Akosua
tèná-à fíé
sit-COMPL house
Father allowed Akosua to stay at home.

c. Àbɔ́frá nó mà-à kwáń mà-à dɔ́kòtà nó
child DET give-COMPL way RESUL-COMPL doctor DET
wɔ-ɔ nó pánéɛ́
pierce-COMPL 3SGSOBJ needle
The child allowed the doctor to administer the injection.

(26)a. Pòlísíní nó mà-à ɔkòrɔ̀mfóɔ́ nó dwàné-èɛ̀
Police DET CAUS-COMPL thief DET run-COMPL
The police allowed the thief to run away.

b. Opoku mà-à Asamoah fò-ò dùá nó
Opoku CAUS-COMPL Asamoah climb-COMPL tree DET
Opoku allowed Asamoah to climb the tree.

In the lexical causative in (25a), an agent who had restrained a dog loosens his grip on the dog, allowing it to move away. Examples (25b-c) involve a resultative construction: (25b) describes a situation where a father agrees to let Akosua stay home and in (25c) a child allows a doctor to administer an injection. Similarly, in the analytic causatives (26a-c), a causer ceases from restraining a causee which results in the causee running away (26a) or climbing a tree (26b). The sentences in (25a-c), however, have one thing in common: in each case, the agent's specific action is overtly expressed and may be construed as volitional. On the other hand, in the analytic causative (26a-b), the causer's action which led to the causee displaying its (intended or acquired) action is not explicitly stated in the construction and, therefore, we cannot readily tell if the action of the causer was deliberate or otherwise. For instance, in (26a), the police out of negligence may not have secured the locks of the cuffs on the thief who had been apprehended and so the thief was able to run away; alternatively, the police may have connived with the thief in setting him free. Likewise, (26b) may describe a situation where Opoku deliberately refrains from acting to prevent Asamoah from climbing the tree or Asamoah climbed the tree when Opoku was not looking on. Thus, in ALLOW the causer's specific action or inaction may be intentional or not intentional depending on the context of the interaction.

It can also be noted from the examples in (25) and (26) that the causee in ALLOW is expressed as having an urge, tendency or disposition toward a certain action (or state). However, in this event type of causation, the causee is not able to display any disposition or tendency it may have immediately because it needs the permission of a stronger entity in position to enable it (the causee) proceed successfully. The stronger force of the causer entity in ALLOW may be physical or social. For example, while we can say that in (25a) Kofi is able to restrain the dog over time because of his greater physical strength, in (25c) even though the doctor (the causee) may be physically stronger than the child, he is able to carry out his action only at the instance of the patient's permission (i.e. if patients right to accept or refuse treatment is consequential). Thus, removal of the causer's force on the causee may sometimes involve social permission, refraining from asserting social influence, rights and privileges rather than physical force.

The following are the properties of the ALLOW event type of causation (27).

(27). *Properties of* ALLOW

- ✓ animate/inanimate causer
- ✓ animate/inanimate causee
- ✓ causer's force may be physical or social (authority, rights and privileges)
- ✓ causer does not act on causee or refrains from blocking it
- ✓ causee displays an urge, tendency or disposition toward a certain result
- ✓ causee is able to display its tendency or disposition when the causer does not assert its greater force, physically or socially.

Figure 5.9. *Force-dynamics of* ALLOW (based on Talmy 2000:418)

a. *causer as (possible) instigator* b. *causer as (possible) restraint*

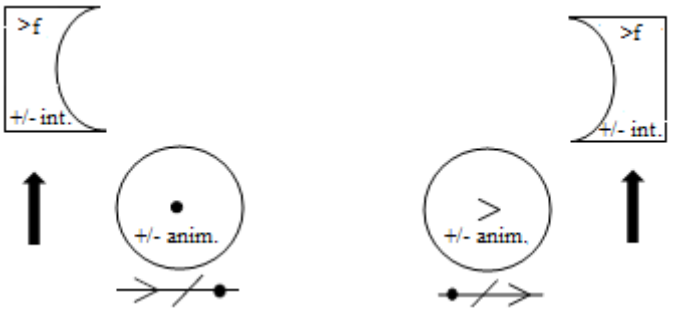


Fig 5.9 presents two force-dynamic patterns in the ALLOW configuration. Fig 5.9(a) represents a situation where a stronger causer who had overturned a causee's disposition toward rest suddenly stays out of position thus allowing the causee to display its original disposition. This pattern is displayed in (25b) where a father who has authority to prevent Akosua from staying home (and perhaps may have exercised this authority sometime) acquiesces allowing Akosua to stay home. Alternatively, as diagrammed in Fig 5.9(b), in ALLOW a stronger causer who had hitherto blocked a causee suddenly removes its force allowing the causee to proceed. For instance in (25c), a child who had been preventing a doctor from administering an injection may suddenly permit the doctor to proceed with that treatment.

In ALLOW, a causee displays a disposition either toward rest (5.9(a)) or movement (5.9(b)) from the beginning of the force interaction. This is because, as Talmy (2000:419) explains, "an object has a natural force tendency and will manifest it unless overcome by either steady or onset impingement with a more

forceful object from outside." This means that the expression of force-dynamics between objects begins with the conceptualization of an object as manifesting a particular state (with regard to force) which may be altered by the exertion of greater force by another entity. In other words, causation cannot be expressed when the inherent tendency of one of the entities (as either toward action or rest) in the interaction cannot be observed or measured, even naively.

Clearly, causing and allowing involve different notions of causation. In causing, a stronger entity, a causer, engages another entity, a causee, through physical or non-physical contact and because of the greater force (also trigger or prompt component) of the causer the entity that is acted upon undergoes a certain change of state. However, in ALLOW, a causee entity which was prevented from displaying its force tendency by a stronger causer entity is now able to manifest its disposition because the entity which acted as a restraint or instigator is no longer in position. Accordingly, the resultant state in ALLOW (5.9) shows two resultant states of the causee separated by a forward slash mark; the first resultant state represents the result of the initial interaction between the stronger causer and the causee (when the causer was in position as instigator or restraint) while the second resultant state depicts the state of the causee after the causer moves away from it. Thus, in ALLOW the interaction of the causer and the causee begins just like any event type involving the notion of causing where a stronger causer overturns the state of a causee but ALLOW involves a subsequent disengagement of the stronger causer from acting on the causee, resulting in the causee displaying its initial force tendency.

In both causing and allowing, however, the causer remains the stronger of the two entities during the entire interaction. Thus, even in allowing, the disengaged causer is perceived as possessing greater force and, therefore, ultimately responsible for the caused event and capable of reversing the current state of the causee. This feature of the causer in both causing and allowing represents a strong relationship between the two notions and this makes it semantically possible for both notions to be expressed in the same predicate and construction. As iterated in this chapter, in causation, an entity is identified as responsible for initiating a set of actions which may result in another entity undergoing a change of state. Also, in allowing a causee's eventual state is perceived as not owing to the strength of the causee alone but to the absence of the greater force of the causer. Consequently, the resultant event may be properly attributed to the action (or inaction) of the stronger causer rather than the relative strength of the causee.

Thus, these two notions of causation both describe a situation where a stronger causer acts in a particular way to bring about another event and may therefore be expressed in the same predicate, as is the case in Akan. Also, as was noted in chapter three the primary semantic function of the causative morpheme *má* involves attributing the concept of BLAME to an entity in an interaction. Again, the causative morpheme does not specify the details of the action of the causer but expresses just the abstract notion of causation. Consequently, the causative morpheme may be interpreted as expressing the notion of causing or allowing depending on the context of the interaction.

The foregone discussion has presented the major event types of causation which can be found in causative expressions in Akan. In the next section, we will discuss another semantic property of causation namely, the (in)directness of a causer's action in bringing about the caused event.

4.0 (IN)DIRECTNESS OF CAUSATION

Causative expressions may be distinguished based on the degree of directness or indirectness of the causer's action in bringing about the caused event. In the literature, this semantic parameter is often held to be evident in different causative expressions in language (Shibatani 1976; Haiman 1983; Dixon 2000 and 2012; Shibatani and Pardeshi 2002; Mathieu-Reeves 2006). In this section, we will explore the direct – indirect causation dichotomy in Akan causatives and show how the major event types of causation discussed above pattern with this semantic parameter of causation.

4.1 Direct – Indirect Causation

Causation is said to be direct when a causer directly manipulates (usually with physical force) a causee to bring about the caused event. On the other hand, indirect causation involves a situation where a causer does not exert force (physical or otherwise) directly on a causee to alter the state or action of the causee. In many languages, these two notions of causation may be expressed by different morphological forms or syntactic structures. For instance, Dixon (2000:67) notes that in Hindi, there are two suffixes *-a* and *-va* which may be used to express direct or indirect causation, respectively. So in (28a), when the suffix *–a*

is used the sentence implies that the laborers built the house themselves without the help of anyone; however, when *–va* is used the sentence means that the contractor did not participate in the actual building of the house but employed some laborers to do so (28b).

(28)a. Məzduuro ne məkan bən***a***ya
laborers ERG house was.made.CAUS
The laborers built the house (Dixon 2000:67).

b. Thekedar ne (məzduuro se) məkan bən***va***ya
contractor ERG laborers INST house was.made.CAUS
The contractor got the house built (by the laborers) (Dixon 2000:67).

In Akan, non-periphrastic causatives involve direct causation while analytic causatives tend to express indirect causation. Consider the examples in (29).

(29)a. Kwame kùm̀-m̀ pàpá nó
Kwame kill-COMPL man DET
Kwame killed the man.

b. Kwame bɔ̀-ɔ̀ pàpá nó kùm̀-m̀ nó
Kwame hit-COMPL man DET kill-COMPL 3SGOBJ
Kwame hit and killed the man.

c. Dɔ́kòtà nó mà-à pàpá nó wù-ĭ
doctor DET CAUS-COMPL man DET die-COMPL
The doctor caused the man to die.

Both (29a-b) involve a causer who acts directly on a causee which results in the death of the latter. In the lexical causative (29a), no specific action of the causer is overtly expressed except that whatever that action was it directly leads to the death

of the causee. Example (29b) expresses the same caused event as (29a) but in this sentence the specific action of the causer (i.e. hitting) is overtly expressed. Thus the cause-effect SVC (29b) entails the lexical causative in (29a) and the latter can be used as a paraphrase of the former. In (29c), however, the causer (the doctor) may not have directly acted on the causee (the man) so as to cause his death rather the death of the man could be as a result of the doctor's negligence or incompetence in stabilizing or restoring the man's health. Thus, even though in (29c) the doctor is expressed as ultimately responsible for the death of the man, he may not have directly caused this event.

The sentences in (29a-c), however, involve force-dynamic properties which may offer a better understanding of the relationship between the causing and caused events and the (in)directness of causation expressed. As we noted in section 3.1, causative expressions such as (29a-b) involve the coercive MANIPULATION event type where a causer with greater force acts on a weaker causee and the causee undergoes a change of state as a result of the causer's greater impingement of force. In (29a), the causing and caused events are not independently profiled but in (29b) both the causing and caused events are stated. Notice however, that in both (29a-b) the causee does not control the caused event as it is totally affected by the causer's action. Thus, the causee's resultant state in (29a-b) can be directly attributed to the physical action of the causer on the causee.

On the other hand, (29c) involves different properties which show a much longer causal chain of events. The analytic causative in (29c) may involve the ALLOW event type (see section 3.5). In (29c), we may imagine a situation where a patient (the causee) may have contracted a potentially fatal ailment and the doctor (causer) is perceived as capable of treating this condition to restore or stabilize the patient's health. However, when the patient is brought to the doctor, for some reason, the doctor neglects the patient and does not act to prevent the patient's condition from worsening, resulting in the eventual demise of the patient. In this instance, the doctor does not act at all and the patient continues to manifest his (acquired) condition with a fatal endpoint. Thus, while the causer in (29c) is ultimately responsible for the eventual state of the causee, he did not directly bring about this state.

The distinction between direct and indirect causation can often be attributed to the nature of the causer's action on the causee. Thus, while direct causation is thought to involve physical contact or manipulation of the causee by the causer, indirect causation may imply less or no physical contact or manipulation between causer and causee in the interaction.[8] It can be noted, however, that this distinction may only partially elucidate the (in)directness of causation expressed because although direct causation usually involves physical contact or manipulation of a causee by a stronger causer, an indirect causer's action may well involve physical contact or manipulation. Thus although there is strong tendency for direct causation to involve physical rather than non-physical manipulation this parameter may not be a reliable yardstick in identifying direct or indirect causation.

A more reliable parameter, however, can be found in how spatial and temporal profiles of the causing and caused events are configured in direct and indirect causation. As noted by Shibatani and Padershi (2002:90), "the ultimate defining feature of direct and indirect causation is the spatiotemporal configuration of the entire causative event." It has been noted that while in direct causation there is a spatio-temporal overlap of causing and caused events, in indirect causation, causing and caused event have distinct or separate spatio-temporal configuration (Shibatani and Padershi 2002:89-90).

Consider how the spatio-temporal configuration of causing and caused events pattern in direct and indirect causation in (30a-b) below.

(30)a. Adowaa dèdá-à Yaw ɛ́nórà
Adowaa put.to.sleep-COMPL Yaw yesterday
Adowaa put Yaw to sleep yesterday.

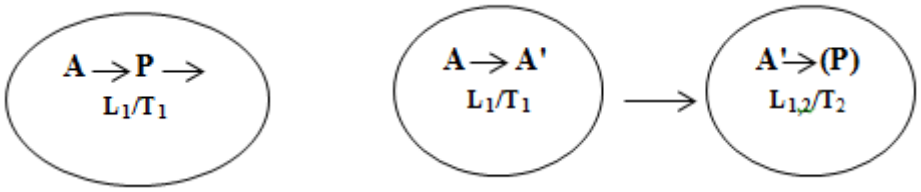
b. Adwoa mà-à Yaw dà-à ɛ́nórà
Adwoa CAUS-COMPL Yaw sleep-COMPL yesterday
Adwoa made Yaw sleep yesterday.

In (30a), a causer performs an action (perhaps singing a lullaby) which triggers an involuntary reaction in the causee, causing the causee to fall asleep. It must be noted that in (30a), both the causer's action and the eventual state of the causee must have occurred yesterday because the time of the causing event overlaps with that of the caused event. In other words, if the causing event in (30a) involves singing to the causee then the causer must have sung till the causee fell asleep. (30b), however, may involve a different situation where the causing and caused

events may have segregated spatio-temporal reference. In (30b), the causer, Adwoa, may have instructed the causee, Yaw, at a time prior to yesterday to sleep but Yaw undergoes this state yesterday. Thus, in (30b), the adverb yesterday may have scope over the caused event and not the causing event. The difference between (30a) and (30b) can be illustrated in Fig 5.10 below.

Figure 5.10. ***Spatio-temporal configuration of direct and indirect causation*** **(Shibatani and Padershi 2002:90)**

a. *direct causation* b. *indirect causation*



As shown in Fig 5.10(a), in direct causation the causing and caused events overlap in space (L_1) and time (T_1) resulting in the expression of the two sub-events as a single event. On other hand, in indirect causation the causing and caused events do not overlap in space and time and so the causing event may be anchored in a distinct spatio-temporal profile (L_1/T_1) from that of the caused event ($L_{1,2}/T_2$). Thus in indirect causation, since the causing and caused events could be unrelated in both time and space a speaker needs to establish a causal link between the two events in expressing causation. In analytic causatives, the causal link between the two events is expressed by the causative predicate in the sentence.

The conceptualization of direct and indirect causation as involving different patterns of spatio-temporal profiles of the causing and caused events may motivate the form of causative expression employed (Shibatani and Padershi 2002:91). As has been demonstrated for many languages, direct causation is typically expressed by a lexical causative in a simple clause. However, since indirect causation involves different spatio-temporal profiles of the causing and caused events they are often expressed in a more complex structure (see Haiman 1983:782). As observed in (29a-c), in Akan, this form-function correlation between direct causation in lexical verbs and simple clauses on the one hand, and indirect causation in complex sentences on the other is encountered.

There are, however, instances where the form-function correlation assumed between indirect causation and periphrastic causatives cannot be rigorously applied in the Akan language. As was demonstrated in section 3.1 and 3.2, analytic causatives may express coercive MANIPULATION and CREATE event types which involve direct causation. For instance, (31a) may involve coercive MANIPULATION where the stronger causer forces the child to eat by feeding him. In (31a), the causing event (putting food in the child's mouth) and the caused event (the child eating the food) may overlap in time and space, constituting a single event. Likewise, in the CREATE event type (31b) the stronger causer performs an action which spatio-temporal span includes the creation of what becomes the causee itself. Thus, although there is a strong tendency for analytic causatives to express indirect causation, the construction may also be used to express an event type which may involve direct causation.

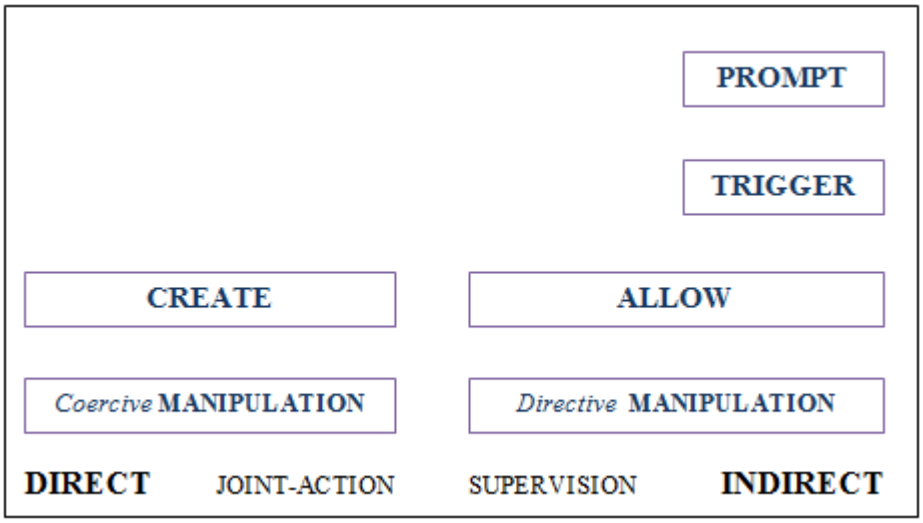
(31)a. Pàpá nó mà-à àbɔ̀frá nó dì-ì fùfúó nó
man DET CAUS-COMPL child DET eat-COMPL fufuo DET
The man made the child eat the fufuo.

b. Áféí Ònyàǹkópɔ́ǹ mà-à wíéḿ bá-èɛ̀
then God CAUS-COMPL expanse come-COMPL
Then God proceeded to make the expanse i.e. God caused the expanse to appear (Genesis 1:7, Asante Bible).

Furthermore, in both coercive MANIPULATION and CREATE event type the causer may be physically involved in bringing about the caused event. For instance, in (31a), the causer, the man, may have to repeatedly scoop food into the child's mouth in order to make the child eat the food. Similarly, in CREATE (31b) the causer's action lasts the entire duration of the creation of the hitherto non-existent causee. Thus coercive MANIPULATION and CREATE event types may involve *joint-action* or *assistive* causation where a causer may be totally or partially involved in the execution of the caused event (Shibatani and Chung 2001:114-116; Shibatani and Padershi 2002:101). The involvement of a causer in the caused event, however, may also be non-physical as is the case in directive MANIPULATION. For instance, we may imagine that (31a) involves indirect causation where the man orders the child to eat the food and to achieve his goal the man monitors the child to see if he is indeed complying with the directive. In this context, the causer, although not physically involved in bringing about the caused event, supervises the causee's action (or reaction) in what may be referred to as *supervision* causation. The two intermediate categories between direct and indirect causation illustrate *sociative* causation (Shibatani and Chung 2001; Shibatani and Padershi 2002).

Fig 5.11 illustrates the conceptual space of the major event types of causation and the degree of (in)directness which they may express.

Figure 5.11. ***Event types and (in)directness of causation in Akan***



As Fig 5.11 illsutrates, the PROMPT and TRIGGER event types involve indirect causation but the causer does not supervise the caused event. It can be recalled that in TRIGGER (section 3.3) and PROMPT (section 3.4) the causer may be an event rather than an object with a trigger or prompt component (+tr./+pr.) which causes the causee to undergo an involuntary action (TRIGGER) or a voluntary action (PROMPT). However, in TRIGGER and PROMPT, the causing event may only initiate the caused event in the causee but cannot monitor or supervise the causee to ensure its success. In the ALLOW event type, a stronger causer acts by disengaging from the causee releasing the causee to manifest its tendency (section 3.5). However, unlike PROMPT and TRIGGER, in ALLOW the caused event can only be sustained when the stronger causer remains away from the causee or there

is a shift in the balance of strengths such that the causee gains greater force to continue displaying its state or action. In effect, in the instance where the causee's expenditure of force is not reinforced over time the causer remains in oversight thus supervising the caused event.

Fig 5.11 departs from the convention of mapping morphosyntactic types of causative expressions to the notion of (in)directness of causation but rather presents the major event types of causation and the (in)directness of causation they may specify. As we have already noted in this chapter, (analytic) causative expressions may be ambiguous as to the event type they specify and may yield different event types of causation varying with context. Thus, an attempt to map causatives forms to (in)directness of causation may risk obscuring the range of semantic properties of the construction most of which may only be recoverable from the context of the expression.

5.0 SUMMARY

This chapter has presented semantic properties of causative expressions in Akan. The study revealed that there are five major event types of causation expressed in causatives in Akan namely, MANIPULATION, TRIGGER, PROMPT, CREATE and ALLOW. It was shown that each of these event types involve distinct semantic properties with regard to the causer, causing event, causee and caused event. Also, it was noted that ALLOW, TRIGGER and PROMPT event types involve indirect causation while CREATE express direct causation. On the other hand, MANIPULATION may involve either direct or indirect causation depending

on the nature of the causer's action; when the causer's action is coercive then there is direct causation but when it is a directive then indirect causation is implied.

ENDNOTES

[1] Wolff et al. (2010) differentiate between 'initiator languages' and 'participant languages' by proposing that the former has intentional agents (animate entities) and typically natural forces as causers but the latter has a wider range of entities which may occur as causers. They indicate that the distinction between these languages can be identified in the grammatical relations such that "in languages in which word order is relatively fixed, due to its role in grammatical relations, the range of entities that can appear in the external argument position is likely to be greater than in languages with more flexible word order, due to their use of a morphological case system to indicate grammatical relations" (Wolff et al. 2010: 193).

[2] Of course, as noted by Talmy (2000:513), not all animate causers may intend the caused event which they bring about that is why one can say *I killed the snake by mistake*. However, the idea of intentionality as assumed here is with regards to an entity's volition in initiating an amount of force in the causative situation.

[3] It would appear, however, that in failed causation, an inanimate entity retains control. For instance, we might conclude from the sentence in (1) that the cloth resisted the force of the fire to an extent so that the fire was unable to consume the entire fabric.

(1). Gyá nó á-ǹ-tùmí á-ǹ-hyé ǹtòmá nó pàpà
fire DET PERF-NEG-can PERF-NEG-burn cloth DET good
The fire could not burn the cloth totally.

However, in this instance, the success of causation depends not on the causee's resistance but rather on the quantity of force exerted by the causer. In other words, anytime the causer (fire) has the quantity of force (heat/temperature) needed to consume the entire piece of cloth, all other things being equal, the outcome is certain. Thus, when it comes to inanimate objects in causation it is the balance in physical properties between the two entities which determines the outcome of causation (see Talmy 2000:433).

[4] It must be noted that Stefanowitch's (2001) definition of the MANIPULATIVE configuration is motivated by analytic causatives and not non-periphrastic causatives like lexical causatives and cause-effect SVCs.

[5] *Bòdúà* is made of animal's tail (especially a cow's tail) and it is used as an ornament by chiefs or priests as a sign of power or authority.

[6] Christaller (1875:245) notes that *kòkòníwá* is derived from *àkókɔ́-(á)níwá* which means 'a chicken's eye' and the term is used to refer to "the sore on a toe the tip of which has been accidentally knocked off, the little bone in the midst of the raw flesh reminding one of the fowl's eye."

[7] The use of the same causative morpheme to express the notions of permission and coercion is not peculiar to Akan; it can be found in quite a number of languages such as Japanese (Shibatani 1976; Miyagawa 1991; Harley 1995) and Korean (Lee 1996; Seungju 2006). Of course, the details of the

alternation between coercive and permissive meaning in such languages are not the same and therefore it is important to examine for each language what motivates such structure(s) of meaning.

[8] Wolff (2003:4) provides a sample of proposals on criteria for establishing and distinguishing direct and indirect causation.

CHAPTER SIX

SUMMARY AND CONCLUSION

1.0 FORMAL TYPES OF CAUSATIVES

This study has presented the various means Akan employs to express perceived force interactions between objects in the real (and abstract) world. Generally, causative expressions in Akan pattern with various formal types of causatives identified in typological studies (see Comrie 1989; Dixon 2000, 2012). Akan causative expressions can be categorized broadly into two main types based on their morphosyntatctic structure namely, non-periphrastic and periphrastic causatives. The non-periphrastic type consists of lexical causatives and cause-effect SVCs while periphrastic causatives involve (quasi) analytic causatives.

Lexical causatives involve the use of lexical verbs to express causation. These are transitive (change of state) verbs which express causation as part their underlying semantics. Lexical causatives, however, may be morphologically analyzable or unanalyzable stems. We observed that most lexical causatives in Akan have no segmented morphology as is typical of verbal predicates in the language; however, some lexical causatives may be derived through reduplication which creates pairs of verbs with different syntactic and/or semantic properties. It was noted however, that reduplication is not a causative derivation process in Akan.

We also explored the verbal alternations displayed in lexical causatives in expressing causative and non-causative meaning. It was shown that in Akan there are, at least, three pairs of verbs which are morphologically unrelated but alternate between causative and non-causative meaning (suppletives). It was suggested, however, that in using such suppletives speakers focus on only a part of the semantics of one of the verb pair. In other words, *kill* and *die* may be constructed as a pair when the endstate of *kill* is compared to the meaning of *die* and the extra semantics of *kill* as involving an external agent blocked from such mapping. Thus, while *kill* implies *die* the opposite may not be true; hence, suppletives are not necessarily constructed as synonyms in language.

Another set of causative/non-causative verbal alternation identified in Akan involves labiles, the use of the same morphological form to express the same event as having been caused by an external agent or occurring spontaneously. Most change of state verbs display such alternation in the language. In this case, the difficulty lies in determining which of the uses of the verb is basic and which one is derived. Applying Levin and Rappaport's (1995) test that in such a pair the basic use of the verb is the one with less selectional restrictions on its arguments, it was concluded that the causative form of the verb is the basic form. It was observed that the causative (transitive) use of the verbs considered takes a wider range of arguments than the non-causative (intransitive) form. Also, the causative form of the verb allows for a wider range of metaphorical extensions in meaning and thus embraces a variety of arguments than the non-causative use of the same

form. Of course, extensive research would be needed to uncover all the details regarding causative/non-causative alternation verbs in the language.

Another non-periphrastic means of expressing causation in Akan involves the use of a serial verb construction in which there are a series of verbs each of which conveys a sub-event of causation expressed by the speaker. In this type of causative construction, the positioning of the verbs in the series reflects the temporal order of causation in which the event(s) described by the verbs occurred (see Durie 1997). It was emphasized, however, that although cause-effect SVCs involve more than one verb, the verb series together is conceptualised as representing a unitary event and, therefore, the verb combinations function like a single predicate (see Osam 1994a, 2004).

On the other hand, Akan periphrastic causatives involve the use of a causative predicate *má* as an initial verb and another verb describing effect. As discussed in section 3.1.1, the causative verb *má* is derived through grammaticalization of *má* 'give'. Unlike non-periphrastic causatives, however, the causative verb *má* does not express any specific action as constituting a causing event but conveys the abstract notion of causation. Consequently, the causative predicate may be used to express both notions of *causing* and *allowing*. Thus, in the analytic causative, *má* attributes the notion of BLAME to an entity as directly or indirectly responsible for the action described by the non-initial verb. Accordingly, the analytic causative relies on context for interpretation as the causative predicate *má* tends to express different event types of causation in a single sentence.

2.0 SYNTAX OF CAUSATIVES

In chapter four, I presented analyses of the syntactic properties of different causative expressions in Akan. It was observed that lexical causatives and cause-effect SVCs behave quite the same in the syntactic properties they display. For instance, it was shown that both causatives have a simple clause structure with only one syntactic subject. Consequently, in reflexivization only this single subject of the construction may control the reflexive. The simple clause structure of lexical causatives and cause-effect SVCs, however, is motivated by the fact that they both express the causing and caused events as a unitary event with a contiguous spatio-temporal profile (see Shibatani and Pardeshi 2002). Accordingly, any adverb which may be placed in a lexical causative or cause-effect SVC would modify both the causing and caused events because the two events are expressed as a unitary event in a monoclausal structure.

In section 2.1 of chapter four, however, I examined Essilfie's (1984:60) claim that cause-effect SVCs involve a reduction of a complex sentence with *má* as a causative linker. It was argued that although this claim seems to apply to a number of cause-effect SVCs with verbs from a limited semantic class, the claim cannot account for a wider range of this type of causative expression and, therefore, falls short of providing a unified analysis of the construction. Significantly, it was observed that not all complement *má* constructions can be reduced to a cause-effect SVC with a deletion of the causative linker *má*. This is because while complement constructions may involve indirect causation where an agent may not have intended the resulting event, in a cause-effect SVC the expression of

causation involves a purposive action on the part of the agent to bring about a certain change of state in another entity. In effect, the concatenation of multiple verbs in a cause-effect SVC signifies speakers' functional attempt to express a chain of events which are causally related to one another as purposive and this causative meaning may be a feature of verb serialization itself (see Dixon 2012:244).

Much attention, however, has been given to unearthing the various syntactic properties of analytic causatives for the reason that the construction presents one of the most outstanding puzzles in the grammar of the Akan language. On the one hand, analytic causatives generally mark tense/aspect and negation in the same way as monoclausal sentences but reflexivization and adverbial modification show them to involve a more complex structure. These unusual properties of a single construction led earlier syntacticians to come up with various (but more often conflicting) conclusions about the syntactic structure of this causative construction. Interestingly, each of the different views holds a unique piece of the puzzle which when pieced together provides a complete picture of the construction.

It was proposed that a clearer understanding of the syntactic properties of analytic causatives begins with separating the two causatives expressed in the language. As noted in chapter four, section 3.2, in Akan analytic causatives the causee argument may be expressed either with subject marking ('ɔ' causative) or object marking ('*no*' causative). It was demonstrated, however, that the different coding of the

causee argument in the analytic causative is not coincidental but points to different syntactic properties of the two causatives. The evidence shows that one of the causatives exhibits less properties of a complex structure but shows more properties of a monoclausal SVC (‘*no*’ causative) while the other shows more properties of a complex structure but less of a monoclausal SVC (‘ɔ’ causative). In other words, the two causatives are better examples of different construction types.

The conclusion that the two causatives are members of different construction types, however, has consequences for the properties often used in identifying a construction as involving a particular clause structure in Akan. For instance, the often stated rule that in Akan *all* complement sentences *must* have an overt complementizer cannot be sustained because even though the ‘ɔ’ causative occurs without a complementizer it nonetheless involves a complex structure. Similarly, the ‘*no*’ causative has been discounted as SVC because it does not express a single event as often assumed for SVCs. However, the criterion of single eventhood should not be viewed as a necessary and sufficient condition on SVC-hood because SVCs cannot be taken to be “a unified phenomenon across languages or even within a single language” (Shibatani 2008:278). Thus, this study emphasises that in analysing clause structure it would be beneficial to adopt a prototype approach in identifying a construction as an instance of a category based on the properties displayed by the construction in question and showing where the properties identified converge with the properties assumed for the category and where they diverge.

It has also been demonstrated that the existence of alternative constructions which express the same meaning in Akan may not be explained away as merely due to dialectal variation. Indeed, we can see a clear difference in the structures exhibited by the Twi and the non-Twi (Fante) dialects as far as complex structures are concerned. For instance, while the '*ɔ*' causative occurs both in Fante and Twi dialects, the '*no*' causative is an innovation in the Twi dialects. One reason for this innovation is that, the Twi dialects do not prefer *mά* as a complementizer and so even though it may have a complementizer function in some constructions such as resultative sentences it is still inflected as a verb.[1] Thus, in constructing the '*no*' causative, the Twi dialects align the causative more closely with multiverbal sentences; hence, the '*no*' causative has fewer properties of a complement sentence. In this way, the Twi dialects maintain a single complement sentence type with *sέ* as complementizer (not *mά*) while restructuring other multiverbal constructions along the lines of serialization. In other words, in the grammar of Twi speakers, any construction which may involve complementation but does not have an overt *sέ* complementizer may be restructured as a syntactically more integrated multiverbal construction.

While the study of language structure can benefit immensely with recourse to discourse and communicative function(s) of a particular construction, it can be noted, however, that the function(s) which may have motivated a particular structure may no longer be in vogue. Accordingly, Cole (1983:115) concedes that "in many languages the semantic principle governing the assignment of the syntactic role of the causee has become grammaticized" and may rather be

regulated by grammatical principles in the construction. Thus, to uncover all the relevant details in analysing alternative constructions in Akan, it is important to recognize that the different dialects of the language may not display the same set of structures and properties and, therefore, each construction must be examined based on internal evidence from the respective dialect(s). In this vein, we must also recognize that the different dialects of the language may have undergone different (syntactic) processes such as grammaticalization or lexicalization of a particular construction (or morpheme). Consequently, in analysing alternative constructions careful attention must be given to the linguistic processes which speakers may have exploited to motivate the construction(s) in question.

3.0 SEMANTICS OF CAUSATIVES

Chapter five of this study presented a Force-Dynamics analysis of the semantics of Akan causatives. The study identified five main event types of causation namely, MANIPULATION, TRIGGER, PROMPT, CREATE and ALLOW, which are conveyed in different causative expressions. It was observed that each of these event types of causation displays distinct patterns and properties of causation. Significantly, we noted that both periphrastic and non-periphrastic causative expressions may be used to express the same event type of causation and thus an effective way of organizing the range of meaning expressed in causation is to determine the major event types rather than isolating form-function correlations.

We have also explored the issue of directness and indirectness of causation expressed in Akan and showed that it is important to map event types of causation rather than causative expressions to the notion of direct indirect causation because causative expressions may be used to convey several event types of causation in the language. Thus, the study shows that while there is a strong tendency for non-productive causatives to involve direct causation but productive causatives to express indirect causation, such form-function correlation cannot be overstretched in the language (see Shibatani and Padershi 2002).

4.0 FUTURE RESEARCH

The goal of this study has been to provide a detailed account of the expression of causation in Akan. However, there are many aspects of this phenomenon which could not be captured in this present research. For instance, there are many constructions which express causation periphrastically by means of conjunctions such as *ńtĭ* 'because' in which the caused event is expressed before the causing event which syntax and semantics need to be examined. There also remain lexicalization of force-dynamics in various expressions such as *dì hó só* 'to control oneself' and *dì mmàrá só* 'to be law abiding' which involve a more complex force-dynamic structure in language. Furthermore, a detailed study of force-dynamics of modals would emphasize the stake of causation in the Akan language.

Another important direction of research would be to explore the expression of force interaction in less physical domains such as within a psyche or in discourse. An analysis of force-dynamics in discourse, for example, would help us to

understand how physical interactions between objects may be transposed into the abstract domain of discourse where the interaction and negotiation of force is not physical. Such a study would also identify and differentiate the set of linkers or, as Talmy (2000:452) puts it, "logic gaters" which are used to signal the negotiation of position in discourse in language.

It can be noted too, that not all concepts involving causation have been examined in this study. Apart from *causing* and *allowing*, there are other concepts such as *blocking/resisting* and *despite* categories which can be investigated in the language. In the latter two categories, the causee is stronger than the causer and so it would be interesting to know whether this concept can be expressed in an analytic causative construction as would *causing* and *allowing*. In expressing failed causation, we can anticipate that some verbal categories such as negation would express force-dynamic meanings the details of which still remain unknown.

Thus, this study opens a new vista of research involving causative expressions in Akan which holds the promise of progressive understanding of the morphology, syntax and semantics of the language.

ENDNOTES

[1] Osam (2007:118), however, indicates that there is evidence that in Akuapem *má* is developing as a complementizer.

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