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Abstract: Abstract
Although in the past few years much debate has focused on the question of shared or collective intentions, the problem of their subject has not been satisfactorily settled. This article critically examines two statements by Philip Pettit and Michael Bratman that suggest distinctive criteria for talk of a subject of collective intention, both of which conclude that it is not, in general, possible to talk of a plural subject of intending. On the basis of a conception of intention primarily related to practical reasoning, I argue in favour of an assignment of intentions to plural subjects. My position, however, does not completely match the most prominent account in favour of plural subjects, namely that of Margaret Gilbert. It focuses on the transactions between the individual and collective levels of practical reasoning. The argument put forward is simpler, in a sense, than in the already existing accounts of the issue; this study aims to complement these existing accounts. In particular, I argue that a more limited conception of the holism of mental states can allow us to conceive of the sharing of mental contents.

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The subject of shared intentions

This article addresses a problem closely related to the issue of shared action, but situated a little upstream: that is, the subject of shared intentions. This question has first been a matter of interest for philosophers, and then for psychologists, leading in turn to a wider interest for joint action in general. Thus, it may be deemed at the origin of the debates to be found in the rest of this volume.

From the philosopher's viewpoint, the problem of collective intentions is subject to a debate structured by the contrast, familiar to sociologists, between "individualistic" and "collectivistic" theories.

The "collectivistic" theories try to construe collective agents (though rejecting the idea of a collective spirit). The most well-known attempt is Margaret Gilbert's: she sees paradigmatic social phenomena (agreements, conventions, shared actions and shared intentions, as well as social groups) as "plural subject phenomena". To Gilbert, plural subjects originate from a "joint commitment" involving several individuals.[1]

The "individualistic" theories reject the idea of collective agents and attempt to construe collective intentions as a set of individual intentions of a special kind. The option of methodological individualism is defended by, among others, J. Searle and M. Bratman. These authors maintain, on the one hand, that not all the phenomena of shared intentions depend on a special kind of commitment; and, on the other hand, that there is not enough evidence to warrant talk of a collective subject.

The problem of the subject of intentions is fundamental, but is not easily settled, due to the ambiguity of the terms "subject" and "intention". It may be helpful to draw a preliminary

[1] See M. Gilbert, "A propos de la socialité: le sujet pluriel comme paradigme" ("Concerning sociality : the plural subject paradigm") *in L'enquête ontologique : du mode d'existence des objets sociaux*, Paris, EHESS, 2000, pp. 107-126

distinction, following P. Pettit and D. Schweikard[2], between different problems or series of problems related to the issue of defining the subject of collective intentions:

> The *I-to-we issue*: can I as a separate agent be rationally moved to think in we-terms and act as the member of a plurality? Or is the shift to we-thinking subrational?
>
> The *we-as-acting issue*: is the primary intention in joint action an intention that we do something together, acting as one? Or is it an intention on the part of each to do his or her bit?
>
> The *we-as-intending issue*: is the primary intention a single state of ours, intending as one? Or is each of us moved only by a separate, individual intention?

This article is primarily interested in addressing the third of these problems and it is important that we do not conflate it with the others. In particular, it will be argued that there is a useful distinction to be made between cases of mere collective action without a corresponding collective intention, and cases involving a collective intention proper.

My aim in this paper is, first, to propose a brief review of some seminal approaches of the problem of shared intentions, trying to contrast them with the particular stance of the subject of the intentions. Therefore, prominent accounts by M. Bratman, J. Searle and M. Gilbert will be assessed in the course of the paper.

Secondly, the aim of this article is to critically appraise two noteworthy proposals that have been made to distinguish cases with a subject of collective intention proper from other, more basic cases of shared intention. These proposals, due to M. Bratman and P. Pettit, set out conditions for talk of a plural subject; they are based on a characterisation of the subject as an individual whose mental states are holistically related, and who appears to be consistent in his motives and choices over time. Such conditions, as will be argued, appear to be too restrictive and incomplete.

Consequently, this paper aims to give a more complete and differentiated characterisation of the conditions under which talk of a plural subject can be accepted. In particular, since the main argument in Bratman's and Pettit's proposals relies on the interrelations among an individual's mental states, this paper will seek to examine the interrelations between collective mental states.

[2] P. Pettit, D. Schweikard, "Joint actions and group agents", *Philosophy of the Social Sciences*, Volume 36 Number 1, March 2006.

In Section 1, we shall carry out an in-depth examination of the notion of intention – a complex notion from the philosophy of action, with vague contours, and serving a variety of purposes. It is impossible to deal with the *subject of collective intentions* without asking first what is expected from such a concept, hence what is expected from the concept of *intention*. More precisely, we will choose to regard intention as a device for practical rationality. Near the end of the section, will be presented in more detail the proposals made by Bratman and Pettit.

Section 2 will review seminal accounts of shared intentions. We shall first examine "individualistic" theories, and argue that they do not account for all that matters in the phenomena of collective intentional action. Then we will proceed to point out some weaknesses of Gilbert's "holistic" position and of her conception of the plural subject.

Finally, sections 3 and 4 will be dedicated to list and classify the conditions that permit to talk of a plural subject of intending in a different sense. Section 3 presents what I chose to label "external" conditions" while section 4, which is the most important, presents "internal" conditions. In this last section it will be argued that the arguments advanced by Pettit and Bratman are not completely satisfying. Another conception of shared intentions, related to the sharing of mental items, will be outlined.

1. What is expected from the concept of intention

a) An ambiguous notion

To be able to deal with the *subject of intentions*, we need to ask ourselves what is expected from the concept of *intention*. This, for sure, is hardly a new question in the philosophy of action. Let me remind some of the difficulties potentially met by those who work on collective intentions.

There is, first, a type of lexical ambiguity which is acknowledged by dictionaries. "Intention" stands alternatively for the project of executing an action, or for the end which is

aimed at through a given action.[3] We can also draw a useful distinction between previous intentions and intentions in acting.[4] These simple, *prima facie* distinctions will serve.

The main problem I want to elicit, though, is a deeper ambiguity: intention is *both a functional and a descriptive concept* – being admitted that both types of concepts can blend in specific instances.[5]

First, intention stands as a functional concept: an intention is defined by the role it plays in the development of action; and the function of the concept of intention is to allow the bringing together of heterogeneous realities in order to adequately represent a step (or an aspect) of this development of action. In this case, intention stands primarily as a useful concept, for representing the activity of practical reasoning. It allows, more concretely, attributions of responsibility. This functional aspect of intention is the one Bratman typically favours in his research on intention and collective intentionality, as he tries to elaborate a concept that would have a definite function: coordinate, structure and control[6] an individual's (or several individuals') action in the future. As previously stated, it is being dealt with approaches that regard intentions as intentional or mental states; Bratman does mean to say that an intention is some sort of mental state; he is not *reducing* intentions to their function, but giving function a central role in his account. Moreover, it is not easy to characterise this mental state. Perhaps the best way to express it would be: "having made up one's mind". This mental state corresponds to a dispositional state: all things equal, I will do what I am intending.

The functional approach is equally favoured, for different reasons, by the proponents of "interpretationism", a view defended by Dennett and applied to collective intentionality by Tollefsen. According to interpretationism, if an agent (*e. g.* a collective agent) is interpretable, then he has intentional states (*e. g.* intentions)[7]. For Tollefsen, the intentional vocabulary we

[3] See the distinction between "effect" and "action" in P. Pettit, D. Schweikard, "Joint actions and group agents", *op. cit.*, p.19.
[4] Searle, J., 1983, *Intentionality: An Essay in the Philosophy of Mind*, Cambridge: Cambridge University Press. The distinction is insisted upon in P. Pettit, D. Schweikard, *op. cit.*: "whether it be an intention formed in advance or an intention that materialises with the behaviour".
[5] Note that the ambiguity I am pointing pertains to the approaches that regard intention as a mental or intentional state, approaches that have become orthodox among philosophers of action, especially after the publication of Davidson's "Intending". See his *Essays on Actions and Events*, Oxford: Oxford University Press, 1980, pp. 83–102.
[6] Cf M. Bratman, "Modest Sociality and the Distinctiveness of Intention", *in Philosophical Studies*…
[7] See D. Tollefsen, "Collective Intentionality and the Social Sciences", *Philosophy of the Social Sciences*, Vol. 32 No. 1, March 2002, pp.25-50.

use about organisations, firms, states, and so on, is intended for a practical use, *e. g.* for attribution of responsibility.[8]

Second, intention is a descriptive concept that designates a mental state, involving a medium which is traditionally a representation. Such representations have often been seen as linguistic statements, sometimes as images, but recent research suggests they may as well be predictive models on a motor level, and not perfectly conscious.[9] A recent model developed by E. Pacherie, named "DPM", does not take statements as its point of departure in order to formalise intentions. Instead, it regards intentions as increasingly specific plans; the action being controlled simultaneously at all levels until the action is achieved. Specifically, Pacherie asserts that the content of distal intentions should be "at least in part conceptual and descriptive" while motor intention provides "informationally encapsulated" models[10], both predictive and inverse[11]. Such precise characterisation of the formats or mediums that serve for individual intentions should help us deal more accurately with the question of the subject of collective intentions. It will be referred to later on.

Nevertheless, a representational model may be partly misleading. An intention is not just a representation: we may perfectly conjure up a sequence of actions that we in no way seek to carry out. An intention must have a temporal anchorage, hence an aspect of indexicality, if a loose one. But this is still not enough: to the representation we must in addition associate a certain degree of belief – what could be defined as a form of "adherence". (Thinking of it, most acknowledged mental states (especially beliefs and desires) involve a representation and "something more" that looks like this adherence; and it is an open question whether this something more transforms the representation, making it of a special kind, or merely adds itself to the representation.) In the case of an individual intention, this can take the form of the beginning of the action[12] or even of an anticipated action: when I am intending to move to the door, I am in some sort ready to accomplish the action.

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[8] D. Tollefsen, "Collective Intentionality", *The Internet Encyclopedia of Philosophy*, 2005.
[9] See E. Pacherie, "The phenomenology of action: A conceptual framework", *Cognition 107*, 2008, p.179-217. More specifically the author evokes characteristics of motor intention named « informationnally encapsulated » and « limited cognitive penetrability » (p.187).
[10] E. Pacherie, "The phenomenology of action: A conceptual framework", *op. cit.*, p. 183, 184, 187.
[11] *Ibid*., p.191.
[12] Indeed E. Anscombe and some contemporary philosophers argue that intention is not a mental state but a kind of being in progress towards the completion of an act. See G. E. M. Anscombe, 1963, *Intention*, second edition, Oxford: Blackwell; and, for a more recent example, M. Thompson, 2008, *Life and Action*, Cambridge, MA: Harvard University Press, p.133-146.

b) A definition of intention

Having laid down these functional and descriptive dimensions in the concept of intention, I propose to maintain a *realistic* definition of intention – hence, reject interpretationism – while adopting a functional characterisation. Intention is not only a category construed by our interpretation of behaviours, for practical needs; it is an object that has constant features, related to a certain spot in the sequence of practical reasoning. What we have to insist upon is the place of intention in a decisional circuit, and thus account, from the descriptive stance, for its role in the development of action[13]. Intention belongs to a circuit that leads to action; typically, it follows a decision on the ends (that is upstream) and precedes a decision about means (that is downstream). As Velleman puts it, "an intention (…) is the state in virtue of which someone is said to have made up his mind."[14]

c) Some arguments favouring the ascription of intention to individual subjects

According to some authors, the subject of the sequence desire – intention – decision – action constitutes a unity, sometimes even a mechanical assembly, that possesses special qualities: non-derived intentionality, capacity for desire and decision, a set of thoughts characterised by their relations and ruled by a series a norms, the most obvious of which is, for philosophers, the norm of rationality. These properties are decisive if one wants to explain action on the basis of intention and they are to be found at the level of an individual subject. The relation between intention and action is notably captured by Searle's notion of intention[15]: the idea of a reflexive representation (contained in itself) causing what it (re)presents, has the advantage of eliciting a relation, which is not interpretative, intention and action.[16] Hence Searle's insistence on the specificity of the mental contents (only individuals can possess an intentionality) and on content internalism ("all intentionality could belong to a brain in a vat"). Searle's position, widely criticised though it has been, has the advantage of

[13] Note that Bratman takes as his point of departure the role of intentions in practical reasoning, while what I propose is to *characterise* intentions through this role.
[14] D. Velleman, "How to share an intention", *in Philosophy and Phenomenological Research* LVII: 29-50.
[15] J. Searle, *Intentionality*, Cambridge : MA, Cambridge University Press, 1983.
[16] In Searle's work, this link, however, is formalised more than explained (only an advanced scientific theory could provide such an explication).

maintaining a strong explicative link between intention and action. It achieves this result on the basis of a reflection over speech acts, which are taken as the models for intentions.

However, as stated previously, the linguistic model for Searle's intention is problematic. Therefore, his position will not be at the centre of the paper. Two proposals by Bratman and Pettit shall be considered instead.

In a recent paper, Bratman rejects the idea of a common subject of shared intention, drawing on on a conception of the subject of intending reminiscent of Davidson's research about the holism of the mental. "To talk of a subject who intends is, he says, to see that subject as a center of a more or less coherent mental web."[17] Thus, Bratman draws a distinction between the idea of a causal agent of shared intentional activity, and a notion of a plural *subject* that he rejects.

Pettit (2006) opts for a slightly different approach by specifying the necessary conditions for the apparition of an intentional subject. Pettit agrees with Bratman that in order to talk of an intentional subject, his several intentional states have to be rather coherent[18]. Thus he estimates that the apparition of a collective subject is not systematically related to collective action, but requires instead particular conditions. These conditions are: 1) setting together a series of common goals; 2) setting together a series of judgments in order to rationally guide action towards these objectives; 3) identify together the persons that will act in pursuit of these objectives.

While it can be agreed that the formation of a collective agent does not go systematically with collective action, nonetheless it seems to me that these requirements are too specific and that it is possible to talk of an intentional subject "more cheaply", without so many requirements fulfilled. To do that, one needs to show how a collective representation can find its place in a decisional circuit on the scale not of an individual but of a group of individuals. This, however, would still not be enough: one would also have to show that the practical rationality of the individuals in this group is influenced by the decisions and

[17] Cf M. Bratman, "Modest Sociality and the Distinctiveness of Intention", *op. cit.*, p.20.
[18] Pettit speaks of: "a novel, consistency-sensitive center of intentional attitude and agency".
See P. Pettit, D. Schweikard, « Joint actions and group agents » *Philosophy of the Social Sciences*, Volume 36 Number 1, March 2006, p.31.

intentions ascribed to the group, which in turn constitute a constraint on their choices and actions of its members.[19]

2. Some seminal accounts from the point of view of the subject of intentions

Before doing this, however following section reviews prominent accounts of shared intentions from the point of view of their subject. This will help to contrast the existing accounts with the view I am suggesting.

To begin with, finer-grained distinctions may be introduced that help organise more precisely the field. Among the philosophers that advocate the idea of collective subjects, some defend, so to say, a "literal" attribution of intentions to collective agents (*e. g.* D. Tollefsen) while others maintain this attribution can only be read in a "figurative" sense (*e. g.* R. Tuomela). Gilbert's position has been interpreted "literally" (Pettit 2006) but she herself has claimed to defend a more deflationist interpretation, the notion of "plural subject" being intended as a *façon de parler*[20]. Fair enough, but how are we supposed to understand this *façon de parler*?

Among the proponents of methodological individualism, we can also point to various solutions. One of them is to derive the *collectiveness* from the psychological mode of the individual intentions; this is the position defended by Searle. In this case, we have *collective* intentions with individual subjects. Another solution is to include my partner's intention in the content of my own and set out as an "external" condition that the contents of both intentions should mesh: this is the position defended by Bratman. In this case we have a set of *individual* intentions attributed to a series of individuals.

a) Two individualistic accounts contrasted

Since the main point of this paper is not to advocate for an individualistic view, I shall only make a few remarks about two different ways to construe an individualistic account of

[19] Guidance on this path can be found in Velleman (1997) and some of Tollesen's papers. See D. Velleman, "How to share an intention", in *Philosophy and Phenomenological Research* LVII: 29-50; D. Tollefsen, "Organisations as True Believers." *Journal of Social Philosophy*, vol 33 (3): pp. 395-411; "Collective Epistemic Agency." *Southwest Philosophy Review*, vol. 20 (1), pp. 55-66. "Rejecting Rejectionism." *Protosociology*, volume 18. pp. 389-408.

[20] Cf M. Bratman, "Modest Sociality and the Distinctiveness of Intention", *op. cit.*, pp.10-11.

collective intentions and illustrate how they leave space for accounts of stronger forms of intentionality.

The accounts I will contrast here are among the most prominent in the literature: they are due to J. Searle and M. Bratman. There are some interesting remarks to be made related to the notion of subject and to the problem of *control* over the action that figures in the content of the intention. Indeed, in one of his last papers, Bratman has contrasted both accounts (his own account and Searle's one) by stating that they represented to ways to answer the problem of control.

Bratman himself has introduced in the literature the *own-action condition* according to which "the subject of an intending is always the subject of an intending is always the intended *agent* of the intended activity."[21] So there is a matter of concern with the idea of an agent intending a collective agent. According to Bratman, Searle's reaction is to deny that collective intentions (what he labels "we-intenions") are subject to the own-action condition. Hence, to Searle we-intentions are distinctive attitudes, due to a primitive background competence. This is what I called the psychological mode of the intention.[22]

On the contrary, Bratman thinks that we can use ordinary intentions, though intentions *that* we act, and not intentions *to* act. This can be done by introducing a condition of common knowledge that the intention is shared.[23]

Thus, both accounts do not use exactly same devices. Some authors remarked that Bratman's "intention that" may be a way to change the subject, conflating intentions with goals. In fact, keeping in mind the three-folded conception of plans that has been outlined in the first question, this reproach would be justified only in the case of proximal and motor intentions. As to the distal intentions, setting out an *intention that* is enough. On the contrary, Searle may be uncomfortable with his strict causal conception of the role of an intention, and of the way it should be written.

Another important difference between the two accounts is to be found in the epistemic constraints involved. Since Bratman's account relies on a condition of mutual knowledge, he

[21] M. Bratman, "Modest Sociality and the Distinctiveness of Intention", *op. cit.*, p.10.
[22] Searle proposes to write, as the mode and not as the content of the intention: "collective B by individual A". See his "Collective Intentions and Action" *in* P. R. Cohen, J. Morgan, and M. E. Pollak, ed., *Intentions in Communication*, pages 401–415.
[23] For more detail see *e. g.* "Modest Sociality and the Distinctiveness of Intention", *op. cit.*, p.11.

owes us a characterisation of what need be involved in order to speak of knowledge.[24] I think this is an interesting problem with respect to the "internalism" of Searle's position. In fact, "knowledge" implies true belief and a mental state involving a true belief about a partner's intention could not be held by a brain in a vat. But knowledge is also an epistemic status. Hence, Bratman can claim that his shared intentions are different in kind from Searle's "we-intentions": a brain in a vat could not have an actual shared intention. Conversely, if there are only true and false beliefs, the difference between actual and false shared intentions is purely external, it is due to the state of the world. So, mutual knowledge is an essential feature to avoid both Searle's internalism and a position which would characterise a type of mental state by appealing to external facts.

Having formulated this remark, I would still be inclined to favour Bratman's account for basic cases of shared intention. But basic cases in not all we are interested in. We are looking for the specificity of shared intentions and it may be that it pertains to the stronger cases. We want to know how much can be shared in the formation of shared intentions, not only what *need* be involved. Hence, there is space for a differentiated treatment of the issue, depending on the cases.

Thereafter, a stronger view, which is the most prominent plural subject view available, will be presented together with its limits.

b) A plural subject view and its limits

The "plural subject" view has been most notably propounded by M. Gilbert. Therefore I will briefly indicate why I do not find her account absolutely satisfying.[25]

The first point of disagreement is about what Gilbert calls *disjunction*: "when two or more people share an intention, none of them need have a personal contributory intention"[26]. She illustrates this by a situation where two persons have share an intention to climb on top of a hill, and at a certain point one of them knows she will not make it. Then, according to

[24] In fact, Bratman himself acknowledges to be relying on an unanalysed notion, referring to well-known accounts as Lewis'. See his "Shared Intention" *in Ethics*, Vol.104, No.1. (Oct., 1993), pp. 97-113, at 99 (in note).
[25] This discussion of Gilbert's position is based on a recent version of her thesis which appeared in the paper "Shared intention and personal intentions", *Philstudies*, 2009, vol. 144, n°1, pp. 167-187.
[26] *Ibid.*, p.171.

Gilbert, it is still valid for the other one to say as a true sentence: "Our intention is to hike to the top of a hill".

This, it seems to me, is overestimating the potential gap between collective and personal intentions. It seems unlikely that if one of the two participants has no intention of hiking to the top of the hill, the other can say without inconsistency "our intention is to hike to the top". At the point when the unable participant says: "actually I cannot go on", the shared intention is *de facto* broken. Till this moment there is indeed a shared representation that looks like an intention. But this representation is lifeless; the normal function of an intention is to bring about an action, but here it will not be the case.

It is true that there may be some gap between shared and personal intentions. For instance, it is possible that an individual "participates" in a shared intention while if one could scrutinise his real personal intentions, one would see he has another incompatible plan. This can occur if the individual thinks the shared intention is based on a very unlikely prevision. But it entails that, if he is rational and were this state of the world to be realised, he would contribute to the shared action. In any case, the more incompatible two intentions are, the more irrational the individual is.[27] It is true, then, that there can be a sort of negotiation between shared intention and personal intention, and Gilbert captures a distinctive feature of such conflicts in asserting that the individual feels the subject both of the shared and the personal intention; but this negotiation must remain within certain boundaries. In sum, the shared intention needs be at least (minimally) *distributive*.

Another matter on which I would part with Gilbert is the importance of *normativity* in her account. To Gilbert, any shared intention goes along with an *obligation*: "each party to a shared intention is obligated to each to act as appropriate to the shared intention"[28]. I do not deny that some shared intentions are due to a strong agreement that creates obligations. But I think that, while individualistic accounts work well for weak cases, Gilbert's account focuses on a very strong case of shared intentions. I would like to find *intermediary* cases where something *more than actions* is shared but something *less than commitments* is involved. These cases would allow concentrating on the transactions between what is individual and what is collective.

[27] Be it theoretical irrationality (one does not see they are incompatible) or practical irrationality (one has two contradictory desires, *e. g.* to please the group, and act in accordance with one's own intention).
[28] *Ibid.*

3. External conditions that make talk of a plural subject possible

What I would like to present now are conditions that make it possible to have a shared intention in the "intermediary" sense I have suggested. The two following sections will be concerned with listing and classifying the different types of conditions. These conditions are subject to degrees.

Moreover, they are of two different kinds. In this section I will focus on the first: the external kind. I will focus on the first kind: external conditions.

In substance, these external conditions specify that talk of a plural subject, or plural centre exercising practical reason, is permitted if there is *space* for such an entity. Consider a firm, an organisation or a state: they take part in a wider network of firms, organisations and states that interact with one another in intentional terms. They have interests, long-term relations and policies that ought to be understandable to one another, and they trust or distrust each other. As a consequence, a firm, an organisation or a state are subject (to a limited extent) to norms of consistency and practical rationality.

These characteristics have been emphasised by D. Tollefsen.[29] Here we are dealing with *organised* collectives who have an institutional existence and are inserted in a particular environment that, once more, provides space for their intentional action. In such cases it is more plausible that the collective entity has an intention that does not correspond to the intention of the majority of its members. Through its actions, a collective entity manifests a series of beliefs, intentions, and possibly desires, that seem to acquire independent existence.

However these intentional states of organised groups, in particular what looks like beliefs, have been the object of an important debate between those who think that the belief is properly assignable to the group and those who claim that a group does not have the capacity for believing, and that what a group does instead is *accept* views[30]. The main argument for this last version is that a group comes to accept views for practical aims. However, this does not demonstrate that groups do not take into account epistemic arguments. The idea that,

[29] See "Collective Intentionality and the Social Sciences", *op. cit.*
[30] See, for a clear presentation of the debate, K. Brad Wray, "What Really Divides Gilbert and the Rejectionists?", *Protosociology* vol.18, 2003.

when this is done for practical aims, we do not face a belief proper, does not seem quite convincing. It will be argued in the following sections that a group can entertain beliefs on the basis of a common practical reasoning. Hence, this question depends on the amount of information and discretion that is shared.

Moreover, the intentional states that we tend to attribute to the group are accessible to the individual members and influence their own beliefs, intentions and desires. This is one way to make positional accounts of group's intentional states more complex.

Hence, external conditions in and by themselves are not enough. But they are conditions that favour the emergence of a proper collective intentionality.

4. Internal conditions

Indeed, talk of a plural subject is valid for entities that satisfy certain internal conditions. Bratman and Pettit have suggested that *coherence* is a necessary criterion. Let me remind Pettit's conditions: 1) setting together a series of common goals; 2) setting together a series of judgments in order to rationally guide action towards these objectives; 3) identify together the persons that will act in pursuit of these objectives.

These conditions are designed to create an autonomous agent, which possesses, so to say, a rationality of its own. (This is especially the meaning / point of the second condition.) Such an agent is able to react in accordance with its own laws to any transformation in the environment. Autonomy requires that the norms of rationality be settled once and for all. Another important feature that can be remarked upon is that these conditions are settled in order to create a subject *downstream*, once an intention is formed. To Pettit, the subject of an intention is an entity able to act *in pursuit* of the intention. In this way, Pettit is following Gilbert's notion of a "plural subject of intending" that is formed once everyone is committed. But shouldn't we call this subject, the subject of *acting-in-pursuit-of-the-intention*?

Designed for an autonomous agent in the strong sense, these conditions may be too strict. Indeed, what is needed to talk of a subject is, according to Bratman, "a more or less

coherent mental web"[31]. This means a coherent set of beliefs, attitudes, judgements etc. Cannot such a subject be obtained with fewer strings attached? Shouldn't it be identified not only downstream, but also upstream, with regard to the intention?

a) Upstream

I suggest that we first look upstream. Remember that an intention is a step in practical reasoning. As such, it involves a set of beliefs and judgements. Moreover, it may involve a set of *arguments*, of *syllogisms*, and (if we agree to maintain a distinction between theoretical and practical reasoning) it is the result of a *practical syllogism*. These are elements of *dynamics* that take part in the reasoning procedure. Holding on to an intention requires having accepted beliefs, judgements and arguments, with the intention reflecting the arguments that have been reviewed and accepted. It also involves a certain belief concerning the states of the world to come and evaluative judgements over the "desirability" of an action[32]. What ought to be demonstrated now is, first, that the mental states involved in the formation and definition of an intention can be organised in a coherent web, just like an individual's *beliefs.* Second, that this web, if not quite as coherent and complete as an individual's mental web, is constituted by the relation between the mental states proper, not *as seen by the* individual. In addition, it will have to be examined how this web may be actually shared.

As to the first point, what I would like to emphasise is a kind of restricted holism of intentional attitudes that bears directly on the mental states involved when forming an intention. Holism has been notably assigned to beliefs, especially by Quine and Davidson. A rather weak version of holism holds that beliefs never go alone: any belief goes along with a series of other beliefs that shape a coherent world. Furthermore, it can be remarked that this dependency is not only due to logical considerations, but also, for instance, to cultural realities. (Hence, if I believe in a polytheist world, it will be easy for me to admit the existence of a variety of spirits in the forests, the lakes and the rivers; but it will be more difficult to do so if I believe in a monotheist world. This is not only a logical problem, for a monotheist can admit angels and evils; it is a matter of cultural affinities.) This kind of holism extends beyond beliefs: it works for attitudes, judgements, arguments and syllogisms. If I

[31] In the course of his paper, Bratman seems to take for granted this thesis that is, notably, among the most controversial. He also tends to consider that mental holism is to be found among an individual's beliefs. While I will try to discuss the second claim, what must be acknowledged is the relation of our problem of the subject for shared intentions to the philosophy of mind and language, especially to the problem of holism and of sharing of mental contents. In this section I am taking as point of departure a restricted version of holism.

[32] These elements are reminiscent of cognitivist and evaluative theories of the intention.

come to accept an argument that favours one opinion, it will be more difficult to consider other arguments that favour the opposite opinion, especially if these arguments take a different view on the same things.

The essential point is that the epistemic relations between the beliefs, the judgements and so on, can be *objective*, that is to say independent of the individual to whom they pertain. This point implies a view of holism in a more restricted sense than in the davidsonian version. The most simple and modest way to spell out a useful theory for our purpose may be the following one: among the various mental states that are related to one particular mental state, some are more relevant and others less so. Hence, the notion of a mental web should not be understood in an absolute way and as the property of an individual.[33] It should be understood as a matter of the logical relations, cultural relations, and so on, that hold between determined mental states (or statements) no matter whose these are. Applying this to the case of shared intentions, the mutual dependence among the intentional states that help form the intention implies a limited amount of coherence, which is not different in kind from the coherence among an individual's mental states.

So we have a reduced, partial web of intentional attitudes: beliefs, attitudes, judgements, and even arguments and syllogisms which are supposed to take part in the dynamics of reasoning. What has to be ascertained is where to *situate* this web. In particular, what ought to be decided is whether, or to what extent, this web can be public.

I am not going to address these issues head-on. Moreover, answering fully would require a much deeper and larger investigation than this paper can afford.

To begin with, it is useful to draw attention to some instances of public expression of mental states. First, since a set of beliefs can be considered as a way of seeing the world (as a representation of the world) there are *things* in the public space that are able to translate or illustrate it. (Coming back to our religious examples, statues and temples suggest the existence of gods: if I am a young Roman and take the social world for granted, I think gods exist.) Second, a belief, but also an attitude or a judgement, can be directly expressed by an assertion ("Gods exist"; "Gods are good") and an assertion can be publicly made. The conclusion of these two points is that a public language (consisting of words proper or of any

[33] In any case, I suspect arguments coming from content externalism could cast doubt on this version of holism.

other medium) is able to express both a mental representation (Gods) and a degree of epistemic value attached to the representation.

If we consider this kind of public language as expression of a mental state (as an intention or as a belief, for instance), it should be associated with other mental state. Three cases may be distinguished.

First, other mental states may have been publicly expressed in the course of practical reasoning. Then these states form a limited web which is public and serves through the process of practical reasoning.

Second, other related mental states are implied by the ones that are subject to public expression. I think we can also regard them as public.

Finally, related mental states may be lodged in the heads of several individuals because of their backgrounds (developmental, cultural, and so on).

As a conclusion of this section, an application to a concrete instance can be attempted. Consider a case of deliberation between two persons about an ordinary matter – say the place they are going to walk to. While forming the intention, both persons are exchanging their views on the topic. A classic version of that story would say that each person considers the case with the data he owns – in particular his memory data – and with his own reasoning ability. But most often, this is not quite the case; while discussing, each person is thinking on the basis of common data. There is nothing incoherent, as we have seen, in talking of a common set of beliefs, or judgements, of a common memory, even of a common way of dealing with problems. The range of these common data is defined by the context, which may be large (when a married couple has to make a decision over a particular problem, they are likely to reason on the basis of long-term common devices) or more restricted (what is accessible at the moment the decision is to be made). Consequently, the sharing of the mental items and operations involved in the course of practical reasoning is a contingent matter, dependant on a wide range of considerations.

Hence, Bratman's argument does not seem perfectly convincing. It should be repeated, nonetheless, that we do not seek to contest the possibility of a shared intention where *less is shared*, nor do we want to posit that the subject of shared intention is always collective. What we mean is that the notion of subject is applicable with considerations of degree.

b) The decision and the originally intended plan

Consider now the moment of the decision.

An intention, as we have seen, is a representation that constitutes a step in the course of my practical reasoning. We need a subject of this representation. This subject, though, must not necessarily be an individual; as such, a representation can be shared, or even public. In particular, the distal intention, whose content is "in part conceptual or descriptive", may be spelled out under the form of a statement or an image that constitutes a public representation, accessible to each member of the concerned group. This is the significance of the central image in Tuomela's paper "We-intentions revisited", one of a billboard on which an intention would be written.

However, it is also evident, as in the case of individual intention, that the mere existence of such public representations, formulating an intention in some language that must be interpreted, is not enough. A particular relationship between the agents of collective action and this representation – a commitment to act in order to achieve the goal intended, or a normative constraint of some kind – is also required. Or, more simply, each participant has to take over the intention. The dimension of *adherence* in intention could seem at first glance in contradiction with the idea of collective sharing; let us say instead that it creates a constraint of *distributivity*[34].

c) Downstream

Now let us look downstream. Here we may find two interesting characterisations of the role of intention.

First, an intention has a force of coercion. An intention I have formed to meet someone at 7 will bias my practical reasoning; it will prevent me from forming new and concurrent intentions, *e. g.* the intention to see a film at the pictures at 6:30. And it can do this for a

[34] The idea of such a constraint is suggested in A. S. Roth's paper, "Shared Agency and Contralateral Commitments" *in The Philosophical Review,* Vol. 113, No. 3 (Jul. 2004), pp. 359-410.

variety of reasons, including psychological reasons (*e. g.* because I dislike self-contradiction). As such, an intention influences future practical reasoning and is self-fulfilling. This point is also emphasised in Velleman's "How to share an intention"[35].

In respect to this first role, what must be seen is that the coercion is not exerted by an individual intention. It is the very shared intention that exerts it. The collective decision, resulting from a collective exercise of practical rationality, influences each participant's personal reasoning. It does this, in part, because I feel committed to the shared intention, for a wide variety of reasons, from a promissory type of commitment to rationality requirements.[36] But it is also effective in virtue of the set of beliefs, judgements and arguments it implies. In this sense a collective intention, pretty much as an individual intention, provides *more reasons* to accomplish the foreseen act.

Another role of the intention downstream is the one identified by Bratman: to coordinate, structure and control my action in the future. Bratman writes in a recent paper that to intend something is "to be disposed to take it as an end for [one's] own means-end reasoning, to be guided in action by this end, and to filter potential options for deliberation with an eye to their compatibility with this end"[37] An intention that I form now is a device that helps me organise my future time. It serves as a point of anchorage – indeed, as a premise – for my future practical reasoning. If I have decided to meet a friend at 7, I will treat any event supervening in the interval in such a way as to be able not to miss the appointment. An intention, then, is a constantly available input for my data-processing (for me, or for my brain).

This is to be related to Pettit's criteria. As previously stated, these criteria seem to me too strict and a bit simplistic. It would be better to talk of a plural subject not in absolute terms, but with in terms of degree instead. Pettit's criteria are designed in such a way that it is always on the basis of the group's standards – of the group's decisions and judgements – that

[35] Though this type of psychological, conditional effect should indeed be taken into account, I agree with Bratman that this is not the main (or the only) effect of an intention, as Velleman would seem to imply. See M. Bratman, *Intention, Plans, and Practical Reason*, Cambridge, MA: Harvard University Press, 1987, §2.5, in which he argues that intentions do not provide inputs to practical reasoning by offering additional reasons.
However, I do not think that Bratman's characterisation excludes a psychological resistance of the intention. Indeed, it seems true that dislike of self-contradiction influences one's choices, though not quite in the way of a *motive* for deliberation.

[36] It is one of the main virtues of Tuomela's "We-intentions revisited" to offer a variety of types of commitments, introducing important distinctions within Gilbert's notion. See "We-intentions revisited…"

[37] Cf M. Bratman, "Modest Sociality and the Distinctiveness of Intention", *op. cit.*, p.18.

the goals are pursued. What is needed is a distinction between levels, which would resemble the distinction between the different types of intentions in the DPM model. Indeed, when acting in order to fulfil an intention, one is progressively forming increasingly specific subplans and, reacting to upcoming events, one is constantly revising these subplans.

A fairly banal observation is that some of these subplans will be, like the original common intention, of the distal type - "at least in part conceptual and descriptive" – while others will be of the proximal type, and still others, of the motor type - "informationally encapsulated" models, both predictive and inverse. Distal types of subplans, the first type, are will be subject to decisions and practical reasoning in much the same way as the first initial intention was, and as we have seen, these decisions and practical reasoning can be plural – to varying extents. Shared discretion and reasoning is possible at the level of subplans. Furthermore, these decisions and reasoning are likely to be exerted on the basis of the same data as the original were; there is a certain amount of coherence among the beliefs, judgements and other mental states involved in the successive deliberations. There is, consequently, no need of a predetermined set of judgements and procedures in order to talk of a plural subject executing the intention, although it is true that this notion of plural subject comes here with degrees, depending on the amount of discretion and information-processing the individuals involved are ready and able to share.

As to both the proximal and motor subplans, it is unlikely that information processing and discretion may be shared, at least to the same extent. It is well possible that information exchanges occur at their levels, but I do not want to venture in such problems here.

Still there is one strong asymmetry in Bratman's analysis of the intention's role in the individual case. It regards the control exerted by a distal intention over the events to come. If an intention is an available input for my data-processing, the problem is that a group of people does not possess as such any natural data-processing apparatus such as a brain.

It is possible that the members of the group share competences in respect to the fulfilment of an intention. If two brothers have the intention to cross the street, one can rely on the other for the right side and vice-versa. But such a sharing is likely to be limited and, in any case, resembles more a division of tasks than the public sharing of information we pointed in the process of elaborating or revising a plan.

Conclusion

All of the last section suggests that it is not only the commitments that make it possible for an intention to be shared. Indeed, many things may be shared, and what exactly is shared is a contingent matter, dependent on the very intention in question.

Our first section outlined a conception of intention as a step in practical reasoning. This conception implies, first, that we consider the exercise of practical reasoning upstream, and its consequences downstream, in order to assign the intention to a subject. In fact, intention is a real mental state but its significance depends on what comes before, and its effects are exerted later. Moreover, we should regard the intention as differentiated in a series of increasingly specific plans, and should be considered in different ways depending on the type of plan. While it appears difficult to imagine the sharing of proximal or motor intentions, there seems to be no inconsistency in the sharing of a distal intention, which is, at least in part, conceptual and descriptive. Finally, intention was characterised as a representation associated with a degree of adherence.

Sections 2 reviewed individualistic and holistic approaches in turn. While these both capture a distinctive feature of shared intentions, there appears to be space for another, intermediary conception of the process of sharing.

This conception was presented in sections 3 and 4, which also presented a listing and classification of the different conditions that allow talk of plural subject of intending. External and internal conditions were distinguished: external conditions refer to the environment of a given group, while internal conditions refer to what is shared between the members of the group.

Section 4 led especially to relax the criteria proposed by Bratman and Pettit. The salient point here is that the conception of a mental centre located in a single individual, responsible for the consistency of his actions and judgments, is not as obvious as it seems. In particular, a more limited and graduated conception of holism would call for a revision of this theory. Adopting such a position allows one to see the relations that exist between the very mental items, public or private, involved in the formation of an intention.

Whereas a full-length discussion of this position was not in the scope of this paper, what should be insisted upon is the relevance of the issue of the holism of contents to the theory of shared intentions. Indeed, previous studies have failed to emphasise such a connection.

One should also note the proximity between this approach and the developing theories of distributed cognition. These theories also lay special emphasis on a common language of representational states and media. They focus on the interactions between different levels of analysis, and therefore cast doubt on too simple a conception of the mental subject-individual assocation.

As a final remark, it should be repeated that the point is not to contest the individualistic account's validity. Our aim instead was to discuss the notion of subject and to present an intermediate conception of the sharing of an intention, which implies *more* than the individualistic account does, but cannot simply be equated with the existing holistic accounts.

Instead of stressing individual commitments, the conception defended here lays emphasis on the exercise of practical reasoning. Indeed, this exercise is neither collective, nor individual. It consists of transactions between these two levels. The "volume" of these transactions itself depends on series of contingent situational facts, some of them pertaining to the wider context (for instance, a common cultural ground) while others have to do with the more immediate context (what has been exchanged in addition to the intention proper). Therefore, this account is not alike Margaret Gilbert's. One of its notable consequences, among others, is that it does not hold a shared intention to be unbreakable if not for the agreement of both parties.