Chapter 2

LITERATURE SURVEY

2.1 Introduction

In [1] Mekni, Mehdi, and Andre Lemieux, "Augmented reality: Applications, challenges and future trends." ,Applied Computational Science—Proceedings of the 13 th International Conference on Applied Computer and Applied Computational Science (ACACOS '14) Kuala Lumpur, Malaysia. 2014: pp. 205, 207 - 209

Augmented reality, in which virtual content is seamlessly integrated with displays of real-world scenes, is a growing area of interactive design. With the rise of personal mobile devices capable of producing interesting augmented reality environments, the vast potential of AR has begun to be explored. This paper surveys the current state-of-the-art in augmented reality. It describes work performed in different application domains and explains the exiting issues encountered when building augmented reality applications considering the ergonomic and technical limitations of mobile devices. Future directions and areas requiring further research are introduced and discussed.

The term Augmented Reality (AR) is used to describe a combination of technologies that enable real-time mixing of computer-generated content with live video display. AR is based on techniques developed in VR and interacts not only with a virtual world but has a degree of interdependence with the real world. As stated in hugues11, "augmenting" reality is meaningless in itself. However, this term makes sense as soon as we refocus on the human being and on his perception of the world. Reality can not be increased but its perceptions can be. We will however keep the term of Augmented Reality even if we understand it as an "increased perception of reality". Ronald Azuma and his team provided valuable and rich surveys on the field of augmented reality in 1997 and later in 2001. However, the last decade has been particularly rich in advances in this growing research field which opened perspectives for several