Interactive Agents Learning their Environment

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Abstract. In this paper we describe the implementation of interactive agents capable of gathering and extending their knowledge. Interactive agents are designed to perform tasks requested by a user in natural language. Using simple sentences the agent can answer questions and in case a task can not be fulfilled the agent must communicate with the user. In particular, an interactive agent can tell when necessary information for a task is missing, giving the user a chance to supply this information, which may in effect result in teaching the agent. The interactive agent platform is implemented in DLP, a tool for the implementation of 3D web agents. In this paper we discuss the motivation for interactive agents, the learning mechanisms and it's realization in the DLP platform.