

# Towards a Multimodal Dialogue Coding Scheme

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In this paper a dialogue coding scheme for annotating speech acts in the context of multimodal design tasks is presented. The scheme is an extension of the dialogue act markup in several layers scheme (DAMSL). DAMSL has been used to annotate human-human task oriented conversations; however, information other than spoken language, like deictic gestures or information conveyed through external representations, such as paper or graphical screen, cannot be taken into account with DAMSL and related coding schemes. The extension proposed provides a methodology to capture deictic and graphical information common in design task oriented dialogues. The scheme has been developed in the context of the *Diálogo Inteligente Multimodal en Español (DIME)* program to support human-computer conversations in which the system has the role of a design assistant in the kitchen design domain.

In section 1 an overview of the DIME project is presented. In Section 2 a brief summary of the DAMSL scheme and some limitations to capture multimodal dialogues are discussed. The proposed extension is presented and discussed in Section 3. The scheme is illustrated with the help some examples. The model is been developed with data acquired through a set of Wizard of Oz experiments. The experimental setting and data-collection experiments are described and discussed in the concluding section.

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