Objectives:

The main objective of this action has been to push forward the frontiers of current research on semantic analysis, inference and conceptualisation for high-level annotation and retrieval of digital audiovisual content.

To achieve this goal this action has brought together leading European research teams working on knowledge-assisted semantic analysis, unification, inference and conceptualisation for high-level recognition of digital content.

In particular, the proposed integrative research has sought solutions to issues for which current approaches fail giving focused attention to two main aspects:

- Semantic learning and inference
- Multimodal analysis.

As in any retrieval task, interface design for browsing, search and retrieval from large repositories of content using low-level features, higher-level semantics and user’s relevance feedback have been considered.

Main Achievements:

- A modular software system for semantic driven annotation and retrieval. The annotation interface and search engine features the following functionalities:
  - Automatic audio-visual content annotation using concepts and levels of abstraction humans are familiar with.
  - The ability to build up a knowledge base from past experience through user interaction (relevance feedback) and adaptive learning.
  - Successful participation in various tasks of the Trecvid benchmarking forum from year 2006 to 2008.
  - Continuous contribution to JPSearch standardisation body.