A User Interaction Paradigm for Physical Browsing and Near-object Control Based on Tags

Pasi Välkkynen

Contents

- Information tag
- Implementation
- UI paradigms
  - PointMe
  - TouchMe
  - ScanMe
- Scenarios
  - Physical browsing
  - Shopping
  - Universal remote control

What is an information tag?

- Small and inexpensive unique identifier
- Attached to a **physical object**
- Limited or no interaction with the object itself
- Does not alter the physical essence of the related object
- Contains some information (typically related to the object)
- Can be read from near vicinity

Shortly about implementation

- Different kinds of tags:
  - Optical: barcode
  - IR beacons
  - RFID: active and passive
- Passive RFID
  - small, simple, cheap tag
  - powered by reader

Interaction methods

- **PointMe**: tag responds if it is pointed
- **TouchMe**: tag responds if it is "touched"
- **ScanMe**: all the tags within range respond to scan request

- Can be combined for **physical browsing** or **Universal Remote Control**

Summary

- Information tag
- Implementation
- UI paradigms
  - PointMe
  - TouchMe
  - ScanMe
- Scenarios
  - Physical browsing
  - Shopping
  - Universal remote control