MOAVI at AGH
Conducted Studies & Demo

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Presentation Plan

- Carried out studies
- How does MOAVI work?
- Downloadable metrics
- Demo of monitoring system
- Future plans
Monitoring of Audio Visual Quality by Key Indicators (MOAVI)

• **Mission**
  - “*To collaboratively develop No-Reference models for monitoring audio-visual service quality*”

• **Goals**
  - To develop set of key indicators describing service quality in general
  - To select subsets for each potential application
  - To concentrate on models based on key indicators contrary to models predicting overall quality
CARRIED OUT STUDIES
Conducted Studies

Signal-Based, No-Reference Metrics

- Capturing Artifacts
- Processing Artifacts
- Transmission Artifacts
- Displaying Artifacts
Blocking
Processing & Transmission Artifact
Blurring
Capturing, Processing & Transmission Artifact
Ghosting
Capturing, Processing & Transmission Artifact
Block Missing
Transmission & Displaying Artifact
Stripe Noise
Transmission & Displaying Artifact
Color Bleeding
Processing & Transmission Artifact
Rainbow Effect
Capturing Artifact
Vignetting
Capturing Artifact
Exposure time distortions
Capturing and Displaying Artifact
Interlace
Processing Artifact
Pillar-boxing/Letter-boxing
Processing and Displaying Artifact
Mute
Capturing and Transmission Artifact
Clipping
Capturing, Processing and Displaying Artifact
HOW DOES MOAVI WORK?
Example 1 – Interlace Metric
Example 2 – Exposure Time Distortion Metric
Example 3 – Block Missing Metric
DOWNLOADABLE METRICS
Downloadable MATLAB Functions

http://vq.kt.agh.edu.pl/ (under construction)
DEMO OF MONITORING SYSTEM
Video: Example of Performance

Blackout
FUTURE PLANS
FUTURE PLANS

• Work on new metrics:
  – Epilepsy Flash Effects
  – Lip sync
  – Any other?

• Study the dependence between artifacts

• Develop Subjective Tests to obtain:
  – Thresholds
  – Feedback
Any comments???

THANK YOU – QUESTIONS AND DISCUSSION

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