The Aesthetiscope: Visualizing Aesthetic Readings of Text in Color Space

hugo liu & pattie maes
mit media laboratory

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psychological aesthetic

• **Aesthetic Formalism**
  – Kant (CofJ, 1790), Platonists, etc.

• **Aesthetic Subjectivism**
  – Based on Burke & Hume’s experientialism
  – Freud’s narcissism (e.g. TU, 1919)

• **Aesthetic as Psychic Game**
  – Wittgenstein: ‘art is a linguistic game’
  – Dewey: art is seduction into perception (AasE, 1934)
  – Shklovsky: art as de-habitualization (AasT, 1917)

Ellsworth Kelly: *Sixty-Four Panels: Colors for a Large Wall* (1951)

Color grids, of early abstract expressionists like, *inter alia*, Sophie Taeuber, Jean Arp, Piet Mondriaan, Paul Klee
A TRANSACTIONAL MODEL OF AESTHETIC

Inspiration
Narrative Text

Artistic
interpretation

Artistic message / representation / signification
(Bell, 1914)

Aesthetic
Envelopment
cipher = γ

Coded
message
(symbolic-mystic qualia)

GAME THEORETIC

EXCLUSIVITY

Satisfaction
gestüger Gehalt
(Hegel, 1835–8)

β deciphers γ 'correctly'

FINAL RESONANCE
"pull"

β deciphers γ 'wrongly'

Person
abduces
Artistic
message

Person viewing
the art

Perception /
Decipherment
with cipher = β
(viewer's p.o.v.)

Seduction

INITIAL RESONANCE
"push"
aesthetic reading

- **Efferent vs. Aesthetic Reading**
  - Rosenblatt (1978)
  - *efferent*: ‘take-away’, mindset
  - *aesthetic*: vulnerable, receptive

- **Aesthetic Potential of Text**
  - What are all possible ways to artistically represent NarrativeX?

- **Space of Interpretation**
  - Jung’s modes of interpretation
    - *thinking, feeling, intuiting, sensing*
  - From Barthes (1964): *culturalize*

- **User Model**
  - People are biased toward certain interpretations; personality MBTI (1976)
interpretation biases -> different aesthetics
aesthetoscope architecture
five evocative readers
Naturalistic Color Logic
(used by: SightReader)

- color epitomes for 4,000 objects/events
- gisted from 100,000-photo collection
- (based on epitomic image analysis of
  Jojic, Frey & Kannan, 2003)

Mood Color Logic
(used by: SentimentReader)

- emotional entailments of color,
  a la Rothko, Albers, Cezanne, Matisse
- (culturally dependent, e.g. ‘white’
  -> *pure* in west,
  -> *death* in east)

Symbolic Color Logic
(used by: ThoughtReader, CultureReader, IntuitionReader)

- i.e., culturally stereotyped colors, e.g.,
  *school bus*, *bee*,
  *smiley face*, *traffic light*, *sun*

- Remaining evocative keywords are forced
  into symbolic colors by semantic expansion, e.g.,
  “traffic light” -- > [red, yellow, green]
blending the five palettes

Caption: Visualizations of the four season keywords (columns) through the optics of one interpretive mode taken at a time (rows).

Caption: Visualizations of the words “sunset” (top-row) and “war” (bottom-row), as interpreted by a Thinking-Sensation dominated perceiver (left-column) versus an Intuition-Feeling perceiver (right-column).

MBTI user model or manual biasing
aesthetiscope examples
human evaluations

Depth evaluation
- 4 judges asked to score, 1000 single-reading-dimension aesthetiscope images
- Prompt: “How plausibly does this artwork communicate the thoughts, cultural notion, imagery, free intuition, feelings you had of this text?”

Breadth evaluation
- “Golden-proportion” aesthetiscope
- Tested aesthetiscope golden renditions of 100 words / 100 poems
- Control: text against random golden rendition
- Population: 26 MIT students rated 20 images each
- Prompt: “this text inspired which of these two artworks?”
- Results:
  • 79% accuracy for poems/songs,
  • 74% accuracy for words

Table 1. Results of depth evaluation of aesthetic impressions from five reading dimensions.

<table>
<thead>
<tr>
<th></th>
<th>Plausibility – 100 Poems/Songs</th>
<th>Plausibility – 100 Evocative Words</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Think</td>
<td>Culture</td>
</tr>
<tr>
<td>Judge1</td>
<td>2.3</td>
<td>2.2</td>
</tr>
<tr>
<td>Judge2</td>
<td>2.0</td>
<td>2.3</td>
</tr>
<tr>
<td>Judge3</td>
<td>2.1</td>
<td>1.9</td>
</tr>
<tr>
<td>Judge4</td>
<td>2.5</td>
<td>2.3</td>
</tr>
<tr>
<td>Avg Score</td>
<td>2.2</td>
<td>2.2</td>
</tr>
<tr>
<td>Avg StdDev</td>
<td>±0.9</td>
<td>±0.7</td>
</tr>
<tr>
<td>Kappa (avg)</td>
<td>0.31</td>
<td>0.33</td>
</tr>
</tbody>
</table>
úintratextual unconsciousù

• a magazine cover to visualize its contents
• given the articles…
  – eco-reflections on mountain city
  – china overhauls economic growth
  – guanxi and its influences

– make these trains of thought…
  countryside → green;
capitalism → greed → green;
capitalism → disgust → vomit → green;
economic growth → living things growth → vegetation → green; guanxi → heart/ties → red;
guanxi in business → strategic → nuanceful → off-primary → shift red to pink
aesthetic pairings: wine+cheese.
music+aesthetiscope?

The memory of you emerges from the night around me.
The river minglest its stubborn lament with the sea.
Deserted like the dwarves at dawn.