

Nanopublication — Computational Image Analysis - AQC0933

by Arnaud Quercy · Db Octaves - Research on Harmony - Reflections 41 · 2025














Claim 1: Computational Image Analysis - AQC0933

The artwork Db Octaves [1] - Research on Harmony - Reflections 41 (AQC0933) [2] by Arnaud Quercy [2] underwent comprehensive computational analysis [3] on 2026-02-04. Method: k-means clustering with 10 colors extracted. Metrics documented: color distribution, texture analysis, brightness/contrast, spatial patterns.

CONTEXT

Analysis performed according to MMIDS-CMP-2025 [3] includes four metric categories: (1) Color distribution via k-means (10 colors), (2) Texture analysis using Haralick features, (3) Brightness and contrast measurements, (4) Spatial pattern characterization. Source image [5]: 1789x2505 pixels. Analysis date: 2026-02-04.

COLOR ANALYSIS

Rank	Color Hex	%	Family	Name
1		55	CCD5 25.3 blue-green	mediumturquoise
2		0D1215 14.9 black	black	black
3		3AACD1 14.8 blue	lightseagreen	lightseagreen
4		066EAB 13.3 blue-violet	darkcyan	darkcyan
5		70E4DD 8.7 green	aquamarine	aquamarine
6		162025 7.9 blue	very dark gray	very dark gray
7		147FBB 7.2 blue-violet	grayish purple	grayish purple
8		ECE7DB 6.5 yellow-orange	white	white
9		325861 0.8 blue-green	darkslategray	darkslategray
10		938A53 0.5 yellow	gray	gray
11		82BE9F 0.3 yellow-green	darkseagreen [Accent]	darkseagreen [Accent]
12		65526D 0.3 red-violet	dusty mauve [Accent]	dusty mauve [Accent]
13		C5B8AE 0.3 orange	silver [Accent]	silver [Accent]

Color Families:

Family	%
blue-green	26.1
blue	22.7
blue-violet	20.5
black	14.9
green	8.7
yellow-orange	6.5
yellow	0.5
yellow-green	0.3
red-violet	0.3
orange	0.3

Accent Colors:

Hex	Family	Name	Chroma
82BE9F	yellow-green	darkseagreen	27.9
65526D	red-violet	dusty mauve	18.4
C5B8AE	orange	silver	7.6

TEXTURE ANALYSIS

Metric	Value
Global Roughness	0.262
Mean Local Roughness	0.022
Roughness Uniformity	0.025
Edge Density	0.059
Mean Gradient Magnitude	0.152
Gradient Variance	0.063
Gradient Smoothness	0.0
Directional Coherence	0.004
Pattern Complexity	0.131
Pattern Repetition	1.0
Detail Frequency Ratio	0.63
Spatial Variation	0.16
Texture Consistency	0.498

BRIGHTNESS & CONTRAST ANALYSIS

Metric	Value
Mean Brightness	0.476
Brightness Variance	0.262
Brightness Uniformity	0.45
Brightness Skewness	-0.268
Brightness Entropy	7.368
Rms Contrast	0.262
Michelson Contrast	1.0
Weber Contrast	0.897
Mean Local Contrast	0.021
Contrast Uniformity	0.0
Dynamic Range	1.0
Effective Dynamic Range	0.827
Shadow Percentage	28.187
Midtone Percentage	43.512
Highlight Percentage	28.301
Shadow Clipping	0.004
Highlight Clipping	0.003
Tonal Balance	0.019
Fine Contrast	0.014
Medium Contrast	0.027
Coarse Contrast	0.039
Multiscale Contrast Ratio	0.356
Edge Contrast	0.152
Contrast Clustering	0.502

SPATIAL DISTRIBUTION ANALYSIS

Metric	Value
Spatial Coherence	0.794
Color Clustering	0.602
Color Transition Smoothness	0.612
Transition Uniformity	0.569
Sharp Transition Ratio	0.1
Transition Directionality	0.004
Mean Saturation	0.592
Saturation Variance	0.066
Low Saturation Ratio	0.155
Medium Saturation Ratio	0.506
High Saturation Ratio	0.34
Saturation Clustering	0.998
Hue Concentration	0.973
Complementary Balance	0.004
Analogous Dominance	0.993
Temperature Bias	-0.99

Methodology

This analysis employs standardized computational methods for objective image characterization. Color extraction uses k-means clustering algorithm. Texture analysis applies Haralick feature extraction. Brightness metrics include mean, variance, and distribution analysis. Spatial patterns are characterized through coherence and clustering measurements. All methods are deterministic and reproducible. Analysis performed by Multimodal Institute's computational imaging systems.

REFERENCES

- [1] Arnaud Quercy (2025). Db Octaves - Research on Harmony - Reflections 41 — Catalog raisonné. <https://arnaudquercy.art/en/catalogue-raisonne/AQC0933.html>
- [2] Quercy, A. (2025). Db Octaves - Research on Harmony - Reflections 41 - Gallery. https://artquamanima.com/en/artworks/2025/12/db-octaves-research-on-harmony-reflections-41_1hyh.html
- [3] Quercy, A. (2025). Computational Image Analysis Standard - MMIDS-CMP-2025 h <https://multimodal.institute/en/publications/2025/11/mmids-cmp-2025-computational-image-analysis-standard-dg1.html>

EPISTEMIC PROFILE

Claim type	computational analysis
Voice	third person
Epistemic status	empirical measurement
Methodology	computational analysis
Certainty	high

CHECKSUM (SHA-256)

e6b483c4206a5e068a9a9ce665ca6f5ab246d-b55f1d2aa577ee8151d9e77f7ff

Artist	Arnaud Quercy
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