

# CHORD PAINTING

## 和弦绘画

(English Chinese Bilingual Version)

(中、英双语版)

Li Xiaohong

李晓虹

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# Overview Of Chord Language | 和弦语言综述

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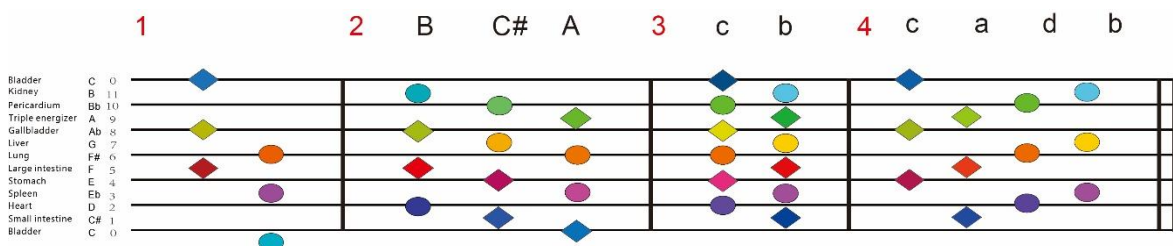
## 引言 | Introduction

和弦语言基于量子化频谱，其形式包括：弦（开、闭、膜弦）；和弦数学（代数结构、群作用）等；生成：时间（音乐）、空间（绘画）、生命（经络）等，分布为和弦场（时空，生命场）。

The chord language is based on the quantized spectrum, and its forms include: strings (open, closed, membrane strings); chord mathematics (algebraic structure, group action), etc.; generation: time (music), space (painting), life (meridians), etc., distributed as chord fields (space-time, life field).

和弦是宇宙的基础结构与统一框架。

Chords are the basic structure and unifying framework of the universe.



基本和弦表：1-1、大三和弦（闭弦）、1-2、小三和弦（开弦）、2、减七和弦（膜弦）、3、全音阶和弦（膜弦）、4、增三和弦（膜弦）

- 和弦频谱公式： $N * F, H^N * F, (H=1.059463, N \in \mathbb{Z})$
- 符号：◆=+ 音符，●=- 音符，音符色=色荷
- 频谱坐标：MOD12 群

BASIC CHORD TABLE: 1-1, MAJOR TRIAD (CLOSED STRING), 1-2, MINOR TRIAD (OPEN STRING), 2, DIMINISHED 7TH (MEMBRANE STRING), 3, DIATONIC CHORD (MEMBRANE STRING), 4, AUGMENTED TRIADS (MEMBRANE STRINGS)

Chord spectrum formula:  $n \cdot f$ ,  $H^{n \cdot f}$ , ( $H=1.059463$ ,  $n \in \mathbb{Z}$ )

Symbols:  $\blacklozenge$  = + note,  $\bullet$  = - note, note color = color charge

Spectral coordinates: MOD12 group

关键词 | Keywords: 和弦场、量子化、弦理论、音乐、绘画、生命、经络

Chord field, quantization, string theory, music, painting, life, meridian

## Chord Spacetime|和弦时空

自然依托于时空框架，目前存在两种基本的时空体系：

Nature relies on the space-time framework. There are currently two basic space-time systems:

和弦（调性）时空：基于和弦（量子化频谱，弦）生成的时空场，常用于音乐、绘画等，用以描述系统的内在结构、自组织关系与语义演化。

Chord (tonality) space-time: A space-time field generated based on chords (quantized spectrum, strings), often used in music, painting, etc. to describe the system's internal structure, self-organizing relationship and semantic evolution.

非和弦（无调性）时空：屏蔽和弦结构（量子化频谱，弦），依赖外部参考系统（如时钟、尺子、参照物）构建的连续、可测量的时空系统，主要用于经典物理学框架中，建立经验性与相对性的概念结构。

Non-chordal (atonal) space-time: a continuous and measurable space-time system that shields the chordal structure (quantized spectrum, strings) and relies on an external reference system (such as clocks, rulers, reference objects). It is mainly used in the framework of classical physics to establish the conceptual structure of empiricism and relativity.

和弦时空由和弦表达，取值公式： $n.f, H^n.f$  ( $H=1.059463, N \in \mathbb{Z}$ )。  $(n.f)h$  ( $h=6.626 \times 10^{-34}$ ) 得到普朗克量子假设，其中  $f_1-f_6$  形成大三和弦， $f_1-f_7$  形成属 7 和弦， $f_1-f_9$  形成属 9 和弦， $f_1-f_{11}$  形成属十一和弦，在这里，量子化来自和弦。

The chord space-time is expressed by chords, and the value formula is:  $n.f, H^n.f$  ( $H = 1.059463, N \in \mathbb{Z}$ ).  $(n.f)h$  ( $h = 6.626 \times 10^{-34}$ ) leads to the Planck quantum hypothesis. Among them,  $f_1-f_6$  form a major chord,  $f_1-f_7$  form a subdominant 7th chord,  $f_1-f_9$  form a subdominant 9th chord, and  $f_1-f_{11}$  form a subdominant 11th chord. Here, quantization comes from chords.

和弦时间与和弦空间镜像对称： $\{-7, -4, 0\} \leftrightarrow \{0, 4, 7\} \bmod 12$ （互为反和弦，反调），可数学转换，空间具有定域性，时间具有非定域性，共同表现为时空二相性；波粒二象性只能在和弦（调性）时空中成立。

Chord time and chord space are mirror-symmetric:  $\{-7, -4, 0\} \leftrightarrow \{0, 4, 7\} \bmod 12$  (they are anti-chords and anti-tones), which can be mathematically converted. Space is local and time is non-local, which together manifest as the space-time duality. The wave-particle duality can only hold true in chord (tonal) space-time.

和弦具有几何语义（开弦，闭弦，膜弦），表达所有空间状态与相互作用，并产生空间场，弦理论的空间思想在和弦时空中可以被观察。

Chords have geometric semantics (open strings, closed strings, membrane strings), express all spatial states and

interactions, and produce spatial fields. The spatial ideas of string theory can be observed in chord spacetime.

音符具有±属性，这是频率的物理属性，应涉及所有波动、频率，也可以解释物理学中普遍存在的±属性。

Notes have  $\pm$  properties, which are physical properties of frequency and should involve all waves and frequencies. They can also explain the ubiquitous  $\pm$  properties in physics.

和弦是物理语言，也是时空语言，音乐（时间域）与绘画（空间域）是其常见形式，这是一个方便的观察途径。

Chords are a physical language as well as a space-time language. Music (time domain) and painting (space domain) are its common forms, which is a convenient way to observe.

## Chord Space And Painting|和弦空间与绘画

和弦频谱分别生成音乐（时间域）与绘画（空间域），二者构成量子化的时空结构，其频率-维度关系为： $nf$ ,  $H^{nf}$ ,  $H=1.059463$ ,  $n \in \mathbb{Z}$ 。在和弦系统中的映射可由集合  $\{-7, -4, 0\} \leftrightarrow \{0, 4, 7\} \bmod 12$  表达，两者镜像对称，可数学转换。

The chord spectrum generates music (time domain) and painting (space domain), respectively, which constitute a quantized space-time structure, and its frequency-dimension relationship is:  $nf$ ,  $H^{nf}$ ,  $H=1.059463$ ,  $n \in \mathbb{Z}$ . The mapping in the chord system can be expressed by the set  $\{-7, -4, 0\} \leftrightarrow \{0, 4, 7\} \bmod 12$ , which is mirror-symmetrical and mathematically transformable.

和弦绘画（空间域）由弦（开弦，闭弦，膜弦）表达，绘画是其观察与应用领域，这是本书的主要内容。

Chord painting (spatial domain) is expressed by strings (open strings, closed strings, membranous strings), and painting is its field of observation and application, which is the main content of this book.

“弦”是“和弦”的几何语义，“和弦”是“弦”的特征频谱。不同的和弦类型对应不同的几何语义：

大三和弦  $(-7, -4, 0) \bmod 12 \leftrightarrow$  闭弦（轮廓线）

小三和弦  $(-7, -3, 0) \bmod 12 \leftrightarrow$  开弦（分面线）

等比和弦：减七和弦  $(0, 3, 6, 9) \bmod 12$ ，全音阶和弦  $(0, 2, 4, 6, 8, 10) \bmod 12$ ，增三和弦  $(0, 4, 8) \bmod 12 \leftrightarrow$  膜弦（非线性空间）

这三种和弦类型共同构成空间场，定义所有可能的空间状态及其相互作用。

"String" is the geometric semantics of "chord", and "chord" is the characteristic spectrum of "string". Different chord types correspond to different geometric semantics:

Major triad  $(-7, -4, 0) \bmod 12 \leftrightarrow$  closed string (contour line)



Minor triad  $(-7, -3, 0) \bmod 12 \leftrightarrow$  open string (Facet line)

Geometric chords: diminished seventh chord  $(0, 3, 6, 9) \bmod 12$ , diatonic chord  $(0, 2, 4, 6, 8, 10) \bmod 12$ , augmented triad  $(0, 4, 8) \bmod 12 \leftrightarrow$  membrane chord (nonlinear space)

These three chord types together constitute a spatial field, defining all possible spatial states and their interactions.

和弦绘画中可以观察到开弦，闭弦，膜弦，是基于观察、实验的空间模型。

Open strings, closed strings, and membrane strings can be observed in chord painting, which is a spatial model based on observation and experiment.

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## Chord Biology; 和弦生命

人类有两种时空-生命观察者：和弦（调性）观察者与非和弦（无调性）观察者，分别观察两种时空-生命形式：和弦包（基于量子化频谱，弦）与生物体（基于细胞），生命包含和弦与形态两个层。

Humans have two kinds of space-time-life observers: chord (tonality) observers and non-chord (atonality) observers, who respectively observe two kinds of space-time-life forms: chord packages (based on quantized spectrum, strings) and organisms (based on cells). Life contains two layers: chords and forms.

在人体中，和弦表现为经络（脉轮）系统，属于和弦观察者的内在经验结构。研究表明：十二经络系统具有受激频谱响应，其分布可近似为：

$$f_n = H^n \cdot f_0 \text{ 其中 } H = 2^{1/12} \approx 1.059463, n \in \mathbb{Z}$$

这说明音乐（时间域）、绘画（空间域）与经络（生命域）共享同一组量子化频谱结构，是和弦场（Chord Field）在不同感知维度中的体现。

In the human body, chords are represented by the meridian (chakra) system, which belongs to the internal experience structure of the chord observer. Research shows that the twelve meridian systems have stimulated spectral responses, and their distribution can be approximately as follows:

$$f_n = H^n \cdot f_0, \text{ where } H = 2^{1/12} \approx 1.059463 \text{ and } n \in \mathbb{Z}$$

This indicates that music (temporal domain), painting (spatial domain), and meridians (life domain) share the same set of quantized spectral structures, which is the manifestation of Chord fields in different perceptual dimensions.

纯小三和弦+导音减七和弦构成生命和弦包——生命的和弦形式；在特定状态下，生命和弦包可独立于生物体，不依赖生物体，具有灵魂的性质。

Pure minor triad + leading tone diminished seventh chord constitute the life chord package-the chord form of life; under certain conditions, the life chord package can be independent of the organism, not dependent on the organism, and has the nature of a soul.

和弦（经络）是生命的物理（量子频谱），数学形式。

The chords (meridians) are the physical (quantum spectrum), mathematical form of life.

## Natural Spirit | 自然精神

人类存在两套语言系统：符号语言（后天语言）与和弦语言（先天语言）；前者是人工信息系统，基于语音符号，如：自然语言；后者是自然信息系统，基于和弦（量子化频谱），如：音乐、绘画，经络等——精神是符号与和弦二层存有。

Humans possess two language systems: symbolic language (acquired language) and chord language (innate language). The former is an artificial information system based on phonetic symbols, such as natural language; the latter is a natural information system based on<sup>1</sup> chords (quantized spectra), such as music, painting, meridians, etc. Spirit is a dual existence of symbols and chords

人的认识来自两个观察者系统：和弦（调性）观察者和非和弦（无调性）观察者，前者产生的知识系统包含和弦结构，无法剥离观察者因素，如：和声学（音乐、绘画），经络、脉轮等，或许还有量子-波粒二象性；后者产生的知识系统屏蔽了和弦作用，可剥离观察者因素，如常规的科学。

Human cognition comes from two observer systems: the chord (tonality) observer and the non-chord (atonality) observer, the former resulting in a knowledge system that contains chord structures that cannot be separated from observer factors, such as: harmony (music, painting), meridians, chakras, etc., and perhaps quantum-wave-particle duality; The latter produces a system of knowledge that shields the chord action and strips away the observer factor, such as conventional science.

和弦语义来自和弦（量子化频谱），是自然精神与意志。

Chord semantics come from chords (quantized spectrum) and are natural spirits and wills.

- 本文内容来自对音乐，绘画，经络等和弦现象的观察，实验。
- 和弦语言出版物有：《和弦语言》与《和弦绘画》，前者介绍和弦语言的语法、语义规则及数学模型，侧重和弦空间语言；后者是和弦绘画（和弦空间）的视觉实验与示范。
- THE CONTENT OF THIS ARTICLE COMES FROM THE OBSERVATION AND EXPERIMENT OF CHORD PHENOMENA SUCH AS MUSIC, PAINTING, AND MERIDIANS.
- THE PUBLICATIONS OF CHORD LANGUAGE INCLUDE: "CHORD LANGUAGE" AND "CHORD PAINTING". THE FORMER INTRODUCES THE GRAMMAR, SEMANTIC RULES AND MATHEMATICAL MODELS OF CHORD LANGUAGE, FOCUSING ON CHORD SPACE LANGUAGE; THE LATTER IS A VISUAL EXPERIMENT AND DEMONSTRATION OF CHORD PAINTING (CHORD SPACE).



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## 1. Heptachord | 七声音阶



Still life, Heptachord A major, f sharp minor; 静物、七声音阶，A 大调、升 f 小调



Still life, Heptachord C major, e flat minor; 静物、七声音阶，C 大调、降 e 小调



Still life, Heptachord C major, e flat minor; 静物、七声音阶，C 大调、降 e 小调



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Still life, Heptachord C major, e flat minor; 静物、七声音阶，C 大调、降 e 小调



Still life, Heptachord F major, d minor; 静物、七声音阶，F 大调、d 小调





Still life, Heptachord A-flat major, b minor; 静物、七声音阶，降A大调、b小调



Still life, Heptachord A major, f sharp minor; 静物、七声音阶，A大调、升f小调



Still life, Heptachord C major, e-flat minor; 静物、七声音阶，C 大调、降 e 小调



Still life, Heptachord A major, f sharp minor; 静物、七声音阶，A 大调、升 f 小调



Still life, Heptachord C major, f sharp minor；静物、七声音阶，C 大调、升 f 小调



Still life, Heptachord A major, f sharp minor；静物、七声音阶，A 大调、升 f 小调





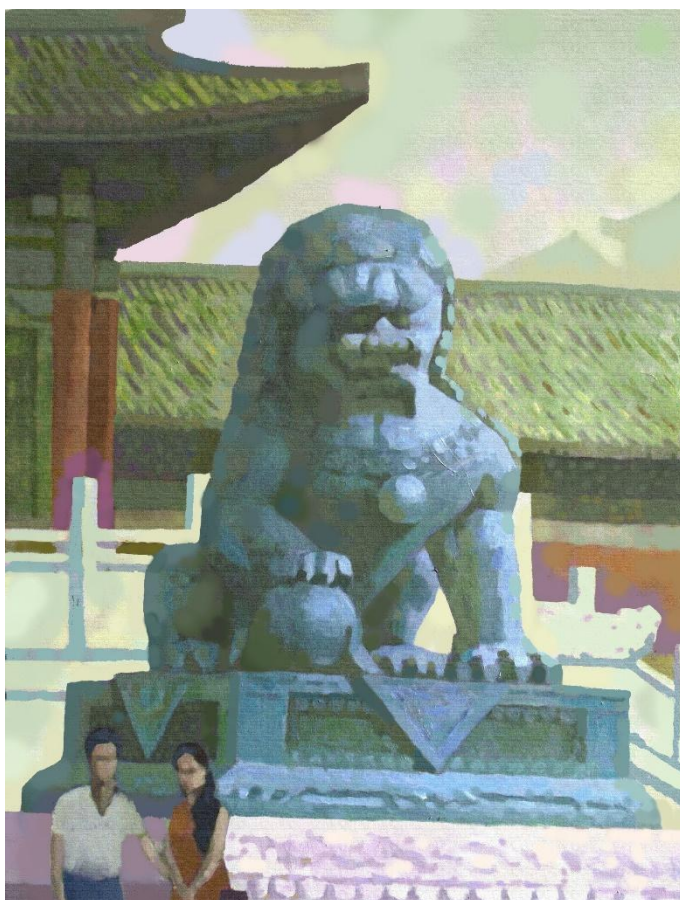
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Still life, Heptachord C major, e flat minor；静物、七声音阶，C 大调、降 e 小调



Still life, Heptachord A major, f sharp minor; 静物、七声音阶，A 大调、升 f 小调

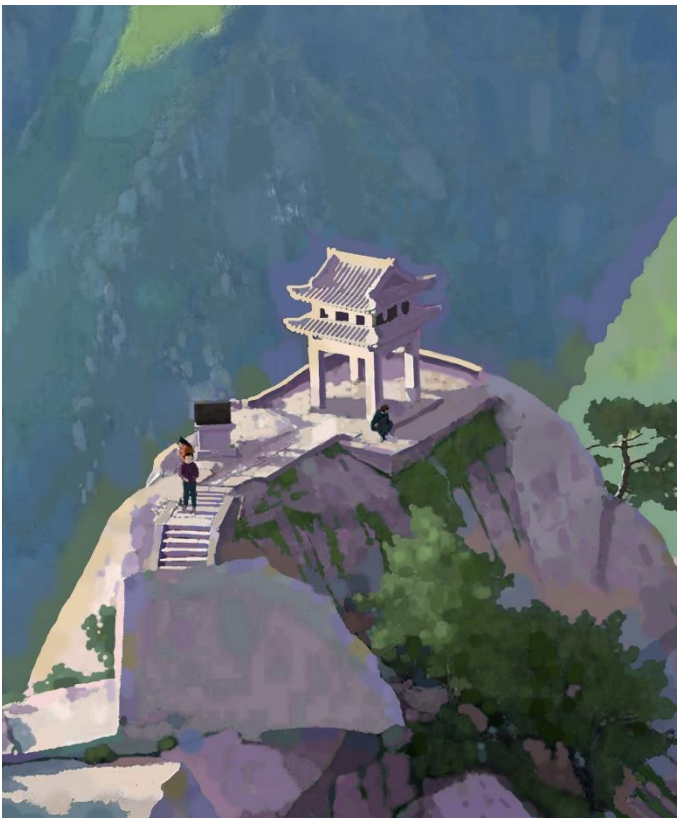


Forbidden City, Heptachord A flat major, b minor; 故宫，七声音阶，降 A 大调、b 小调





Huashan, heptachord F major, d minor; 华山，七声音阶 F 大调、d 小调



Huashan, heptachord F major, d minor; 华山，七声音阶 F 大调、d 小调



Heptachord F major, d minor; 七声音阶 F 大调、d 小调



Mount Emei, Heptachord A flat major, d minor; 峨眉山, 七声音阶降 A 大调、d 小调





Heptachord A flat major, d minor; 七声音阶，降A大调、d小调



Heptachord A flat major, d minor; 七声音阶，降A大调、d小调



Heptachord A flat major, d minor; 七声音阶，降A大调、d小调



Heptachord A flat major, b minor; 七声音阶，降A大调、b小调



Portrait, Heptachord A flat major, d minor; 肖像, 七声音阶, 降A大调、d小调



Portrait, heptachord A flat major, b minor; 肖像, 七声音阶, 降A大调、b小调

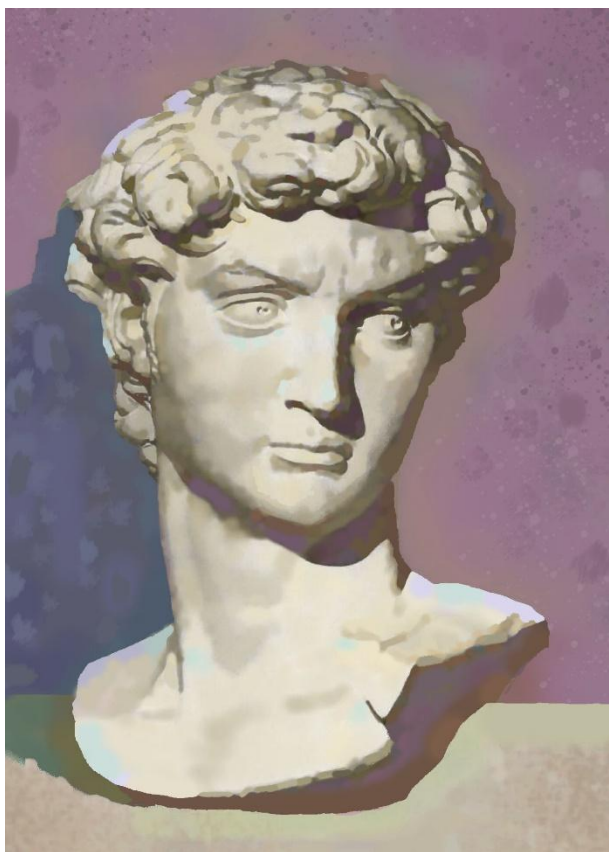




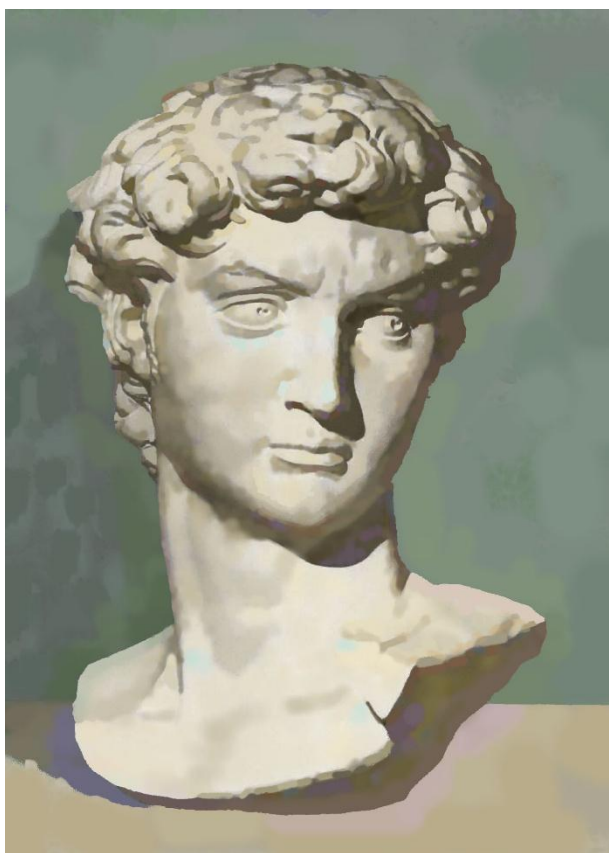
Self-portrait. heptachord A flat major, d minor; 自画像，七声音阶，降A大调、d小调



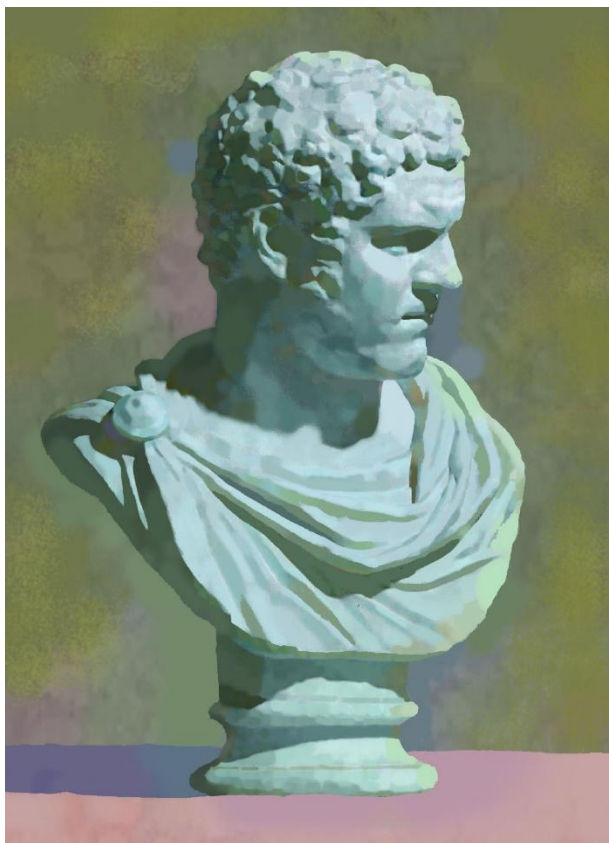
Self-portrait. heptachord A flat major, d minor; 自画像，七声音阶，降A大调、d小调



Heptachord C major, f sharp minor; 七声音阶，C 大调、升 f 小调



Heptachord, A major, f sharp minor | 七声音阶，A 大调，升 f 小调



Heptachord b flat minor, E major; 七声音阶 降 b 小调、E 大调



Heptachord f sharp minor, C major; 七声音阶，升 f 小调、C 大调





Heptachord, A major, f sharp minor | 七声音阶，A 大调，升 f 小调



Heptachord f flat minor, C major; 七声音阶，升 f 小调、C 大调



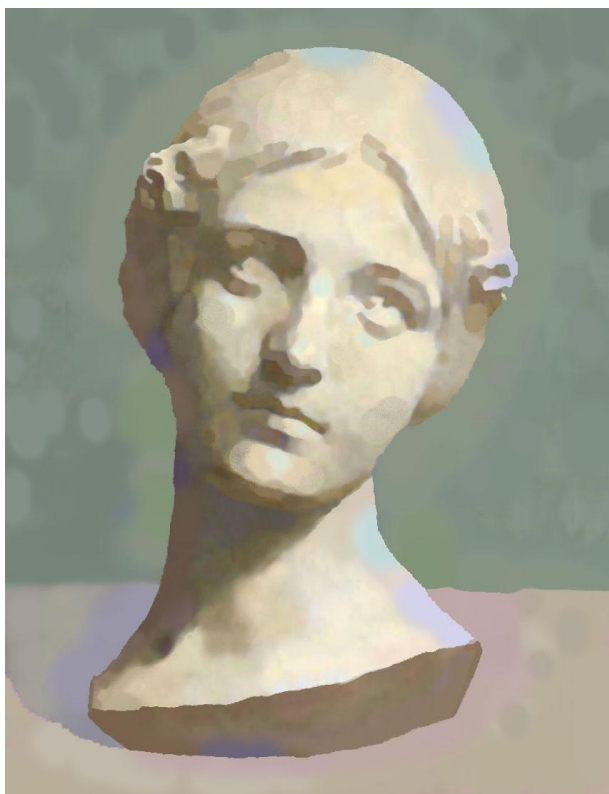
Heptachord f sharp minor, C major; 七声音阶，升f小调、C大调



Heptachord, C major, f sharp minor | 七声音阶，C大调，升f小调



Heptachord f-sharp minor, C major: 七声音阶，升f小调、C大调



Heptachord f-sharp minor, A major: 七声音阶，升f小调、A大调



Heptachord f sharp minor, C major | 七声音阶，升f小调、C大调



Heptachord f-sharp minor, A major; 七声音阶，升f小调、A大调



Heptachord f-sharp minor, A major; 七声音阶，升f小调、A大调



Heptachord f sharp minor, C major | 七声音阶，升f小调、C大调



## 2. Jazz Scale | 爵士音阶



Still life,Jazz Scale,C major,f# minor; 静物、爵士音阶，C 大调，f#小调



Still life,Jazz Scale,C major,f# minor; 静物、爵士音阶，C 大调，f#小调



Still life,Jazz Scale,C major,f# minor；静物、爵士音阶，C 大调，f#小调



Still life,Jazz Scale,C major,f# minor；静物、爵士音阶，C 大调，f#小调

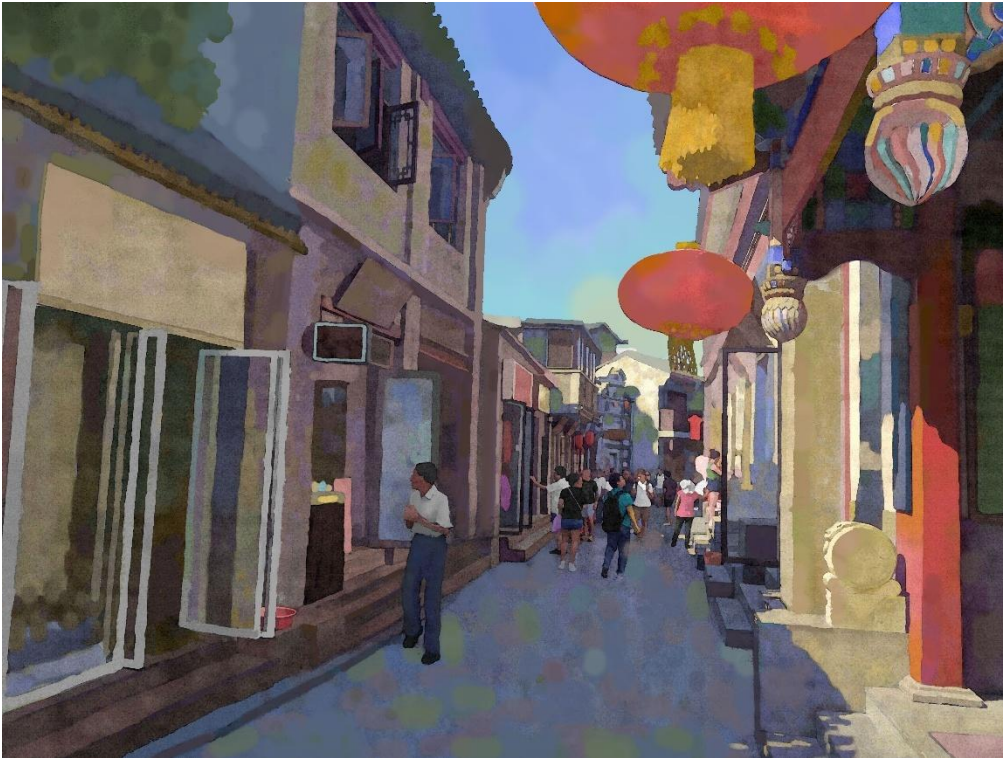


Still life, Jazz Scale, C major, f# minor; 静物、爵士音阶，C 大调，f#小调 0

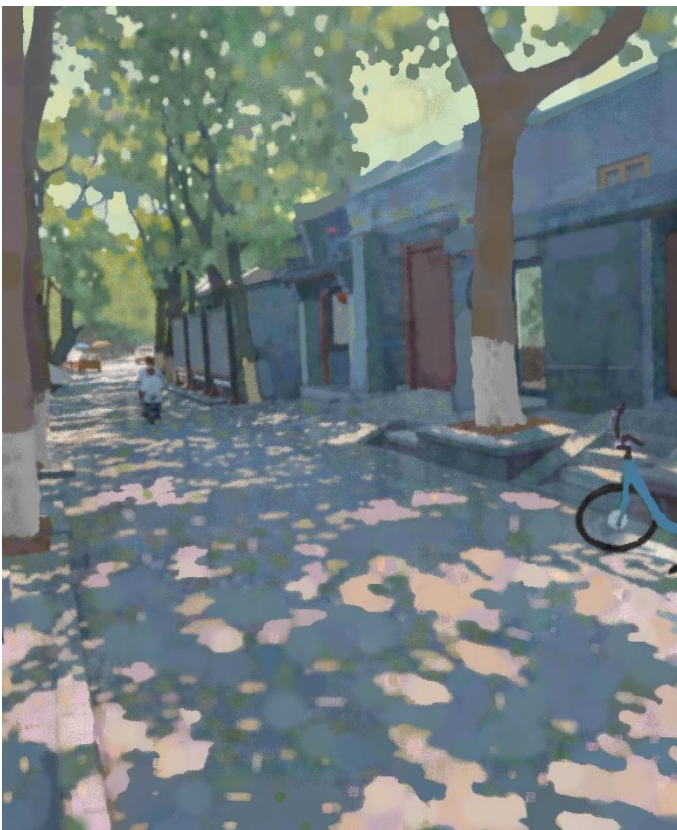


Still life, Jazz Scale, C major, f# minor; 静物、爵士音阶，C 大调，f#小调





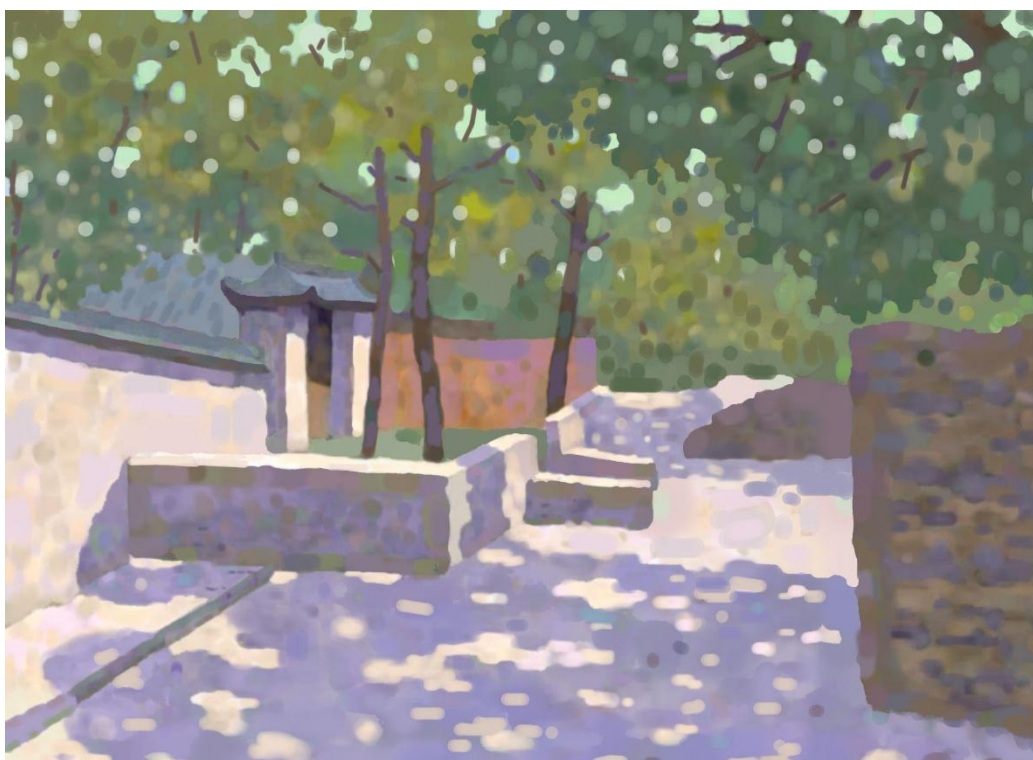
Beijing hutong, Jazz Scale C major; 北京胡同、爵士音阶 C 大调



Beijing hutong, Jazz Scale C# major; 北京胡同、爵士音阶 C#大调



Beijing hutong, Jazz Scale A major; 北京胡同、爵士音阶 A 大调

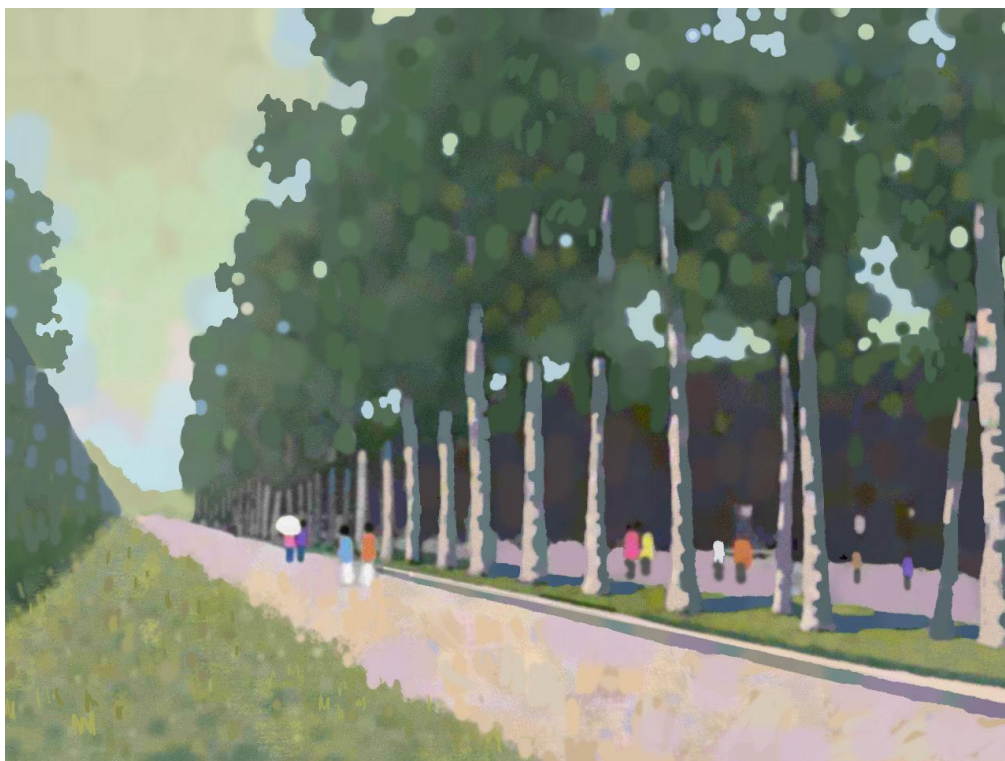


Cao Xueqin's Former Residence in Beijing, Jazz Scale A Major; 北京曹雪芹故居，爵士音阶 A 大调

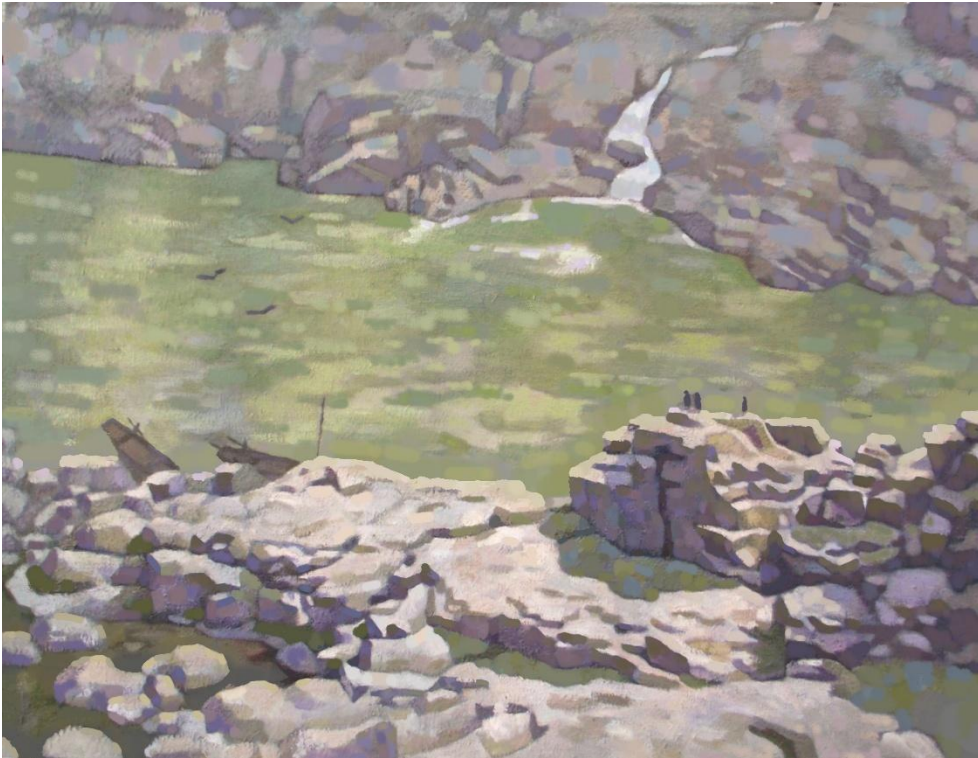




Poplar forest, Jazz Scale A major; 白杨林、爵士音阶，A 大调



Poplar forest, Jazz Scale A major; 白杨林、爵士音阶，A 大调

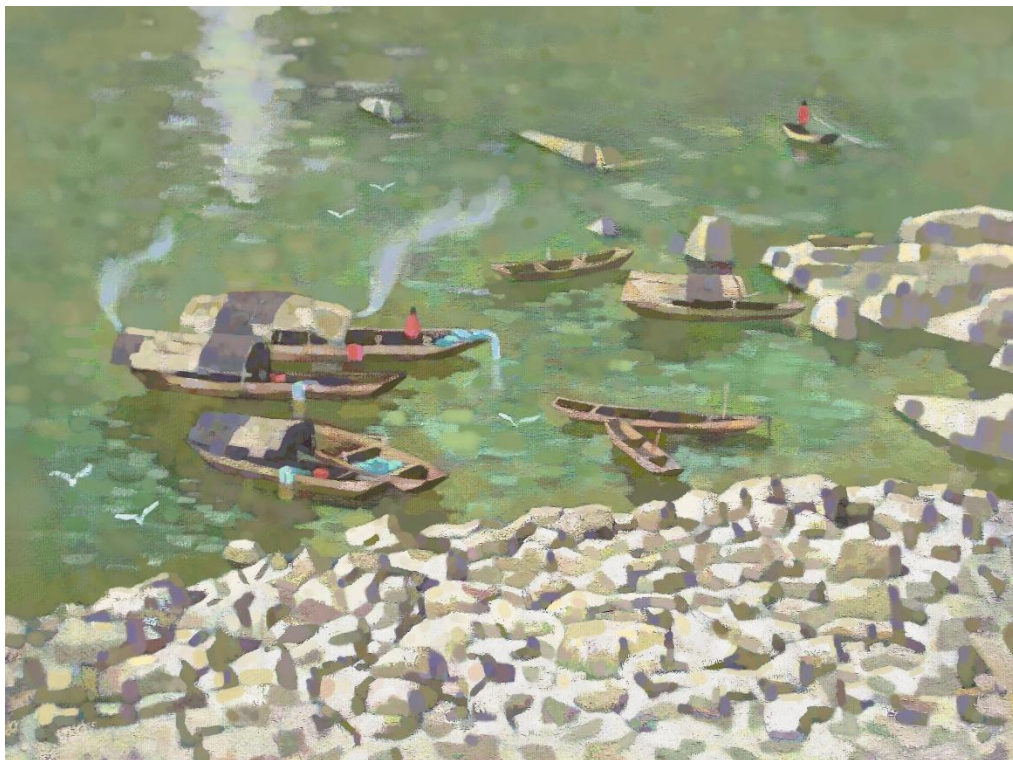


Jinsha River Valley, Jazz Scale in g minor; 金沙江河谷，爵士音阶 g 小调



Fishing Boat, Jazz Scale in f# minor; 渔舟，爵士音阶，f#小调

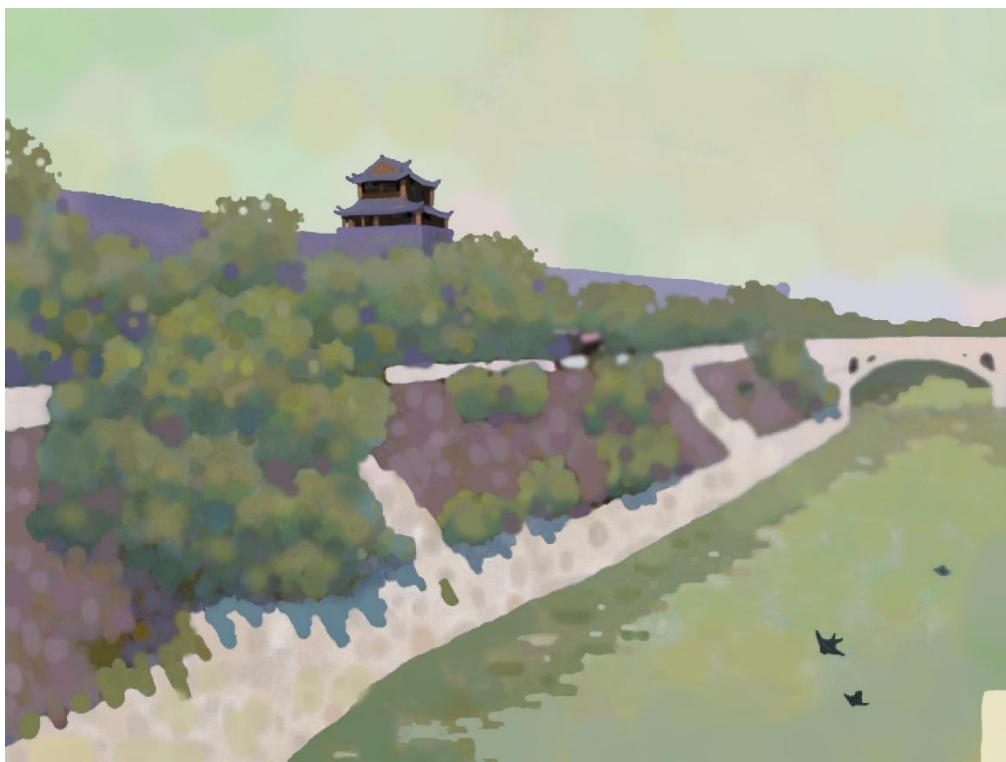




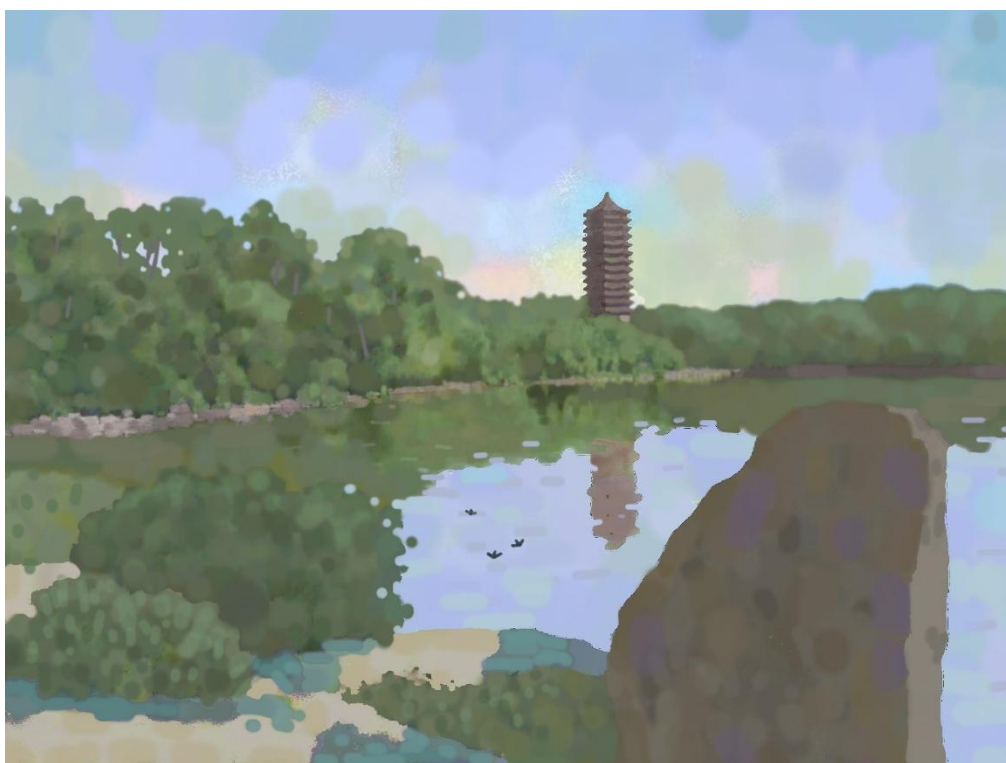
Riverside, Jazz Scale A-flat major; 江边、爵士音阶，降A大调



Xi'an City Wall, Jazz Scale, C# major; 西安城墙，爵士音阶，C#大调

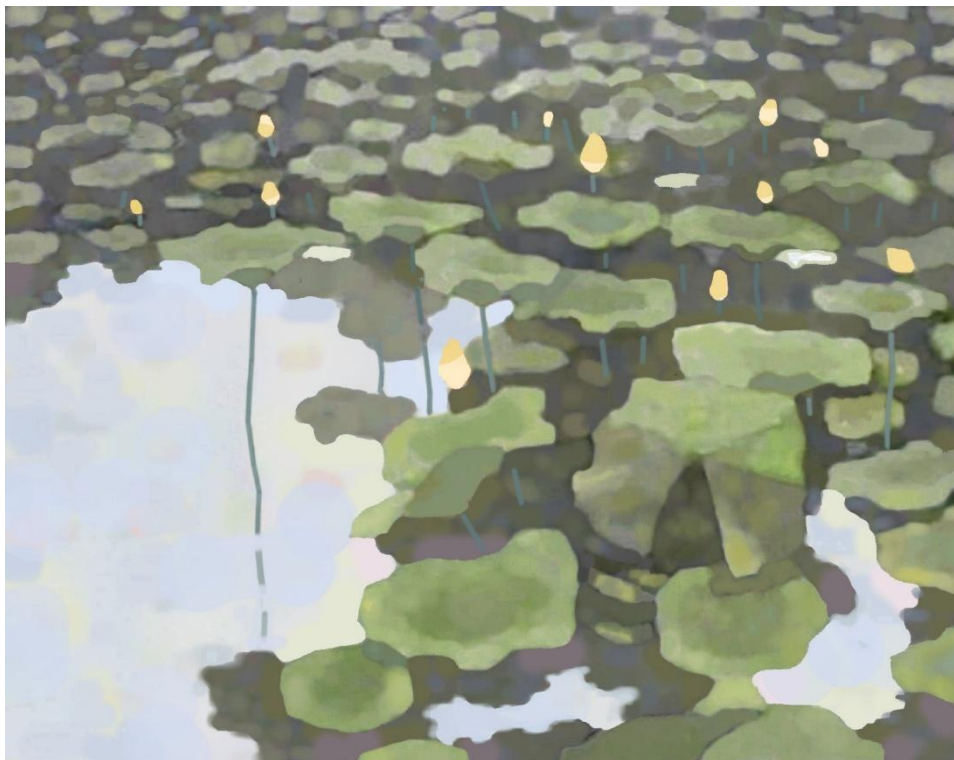


Xi 'an City Wall, Jazz Scale,A major；西安城墙，爵士音阶，A 大调



Unnamed Lake,,Jazz Scale,C major,f# minor；未名湖、爵士音阶 C 大调，f#小调





Lotus, Jazz Pentatonic Scale C major; 荷，爵士音阶 C 大调



Dutch, Jazz Pentatonic Scale A major; 荷、爵士五声音阶 A 大调



Canyon, Jazz Pentatonic Scale C# major; 峡谷、爵士五声音阶 C#大调



Ancient town, Jazz Scale b minor; 古镇、爵士音阶, b 小调





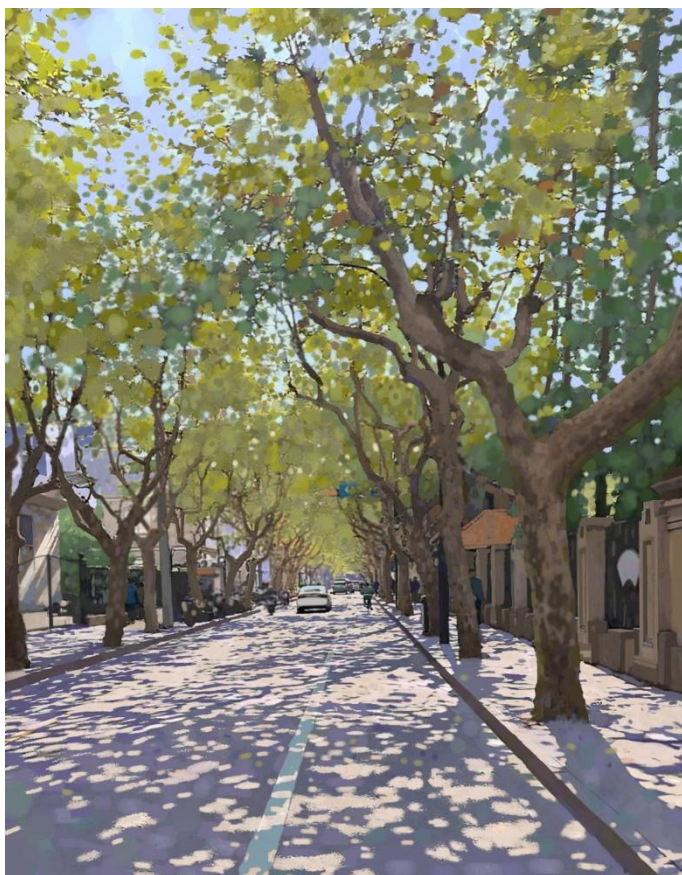
Mountain, Jazz scale C# major | 山、爵士音阶 C#大调



Sun Zhongshan Former Residence in Shanghai, Jazz Scale C Major: 上海孙中山故居，爵士音阶 C 大调



Xu Jiahui's morning, jazz scale C major; 徐家汇的早上, 爵士音阶 C 大调



Shanghai Sinan Road, Jazz Scale C# Major; 上海思南路, 爵士音阶 C#大调





Middle Huaihai Road, Shanghai, Jazz scale C major; 上海淮海中路，爵士音阶 C 大调



East Coast, jazz scale C major; 东海岸，爵士音阶 C 大调



Donghai Bridge, jazz scale C major; 东海大桥，爵士音阶 C 大调

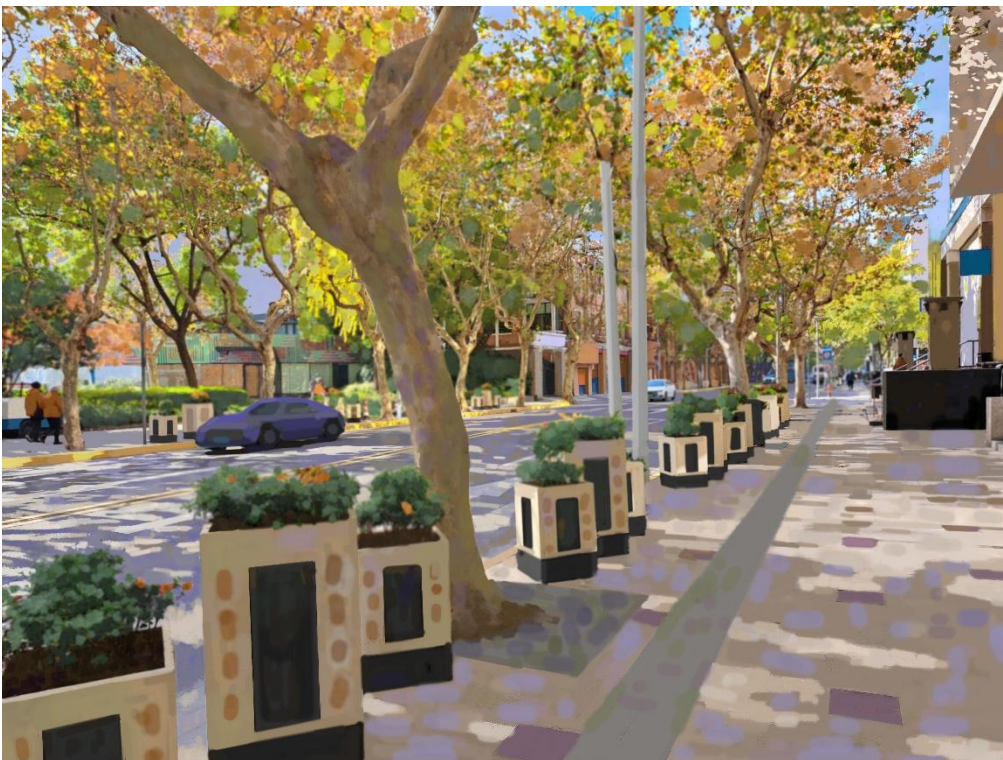


Nanhui East Coast, jazz scale C# major; 南汇东海岸，爵士音阶 C#大调



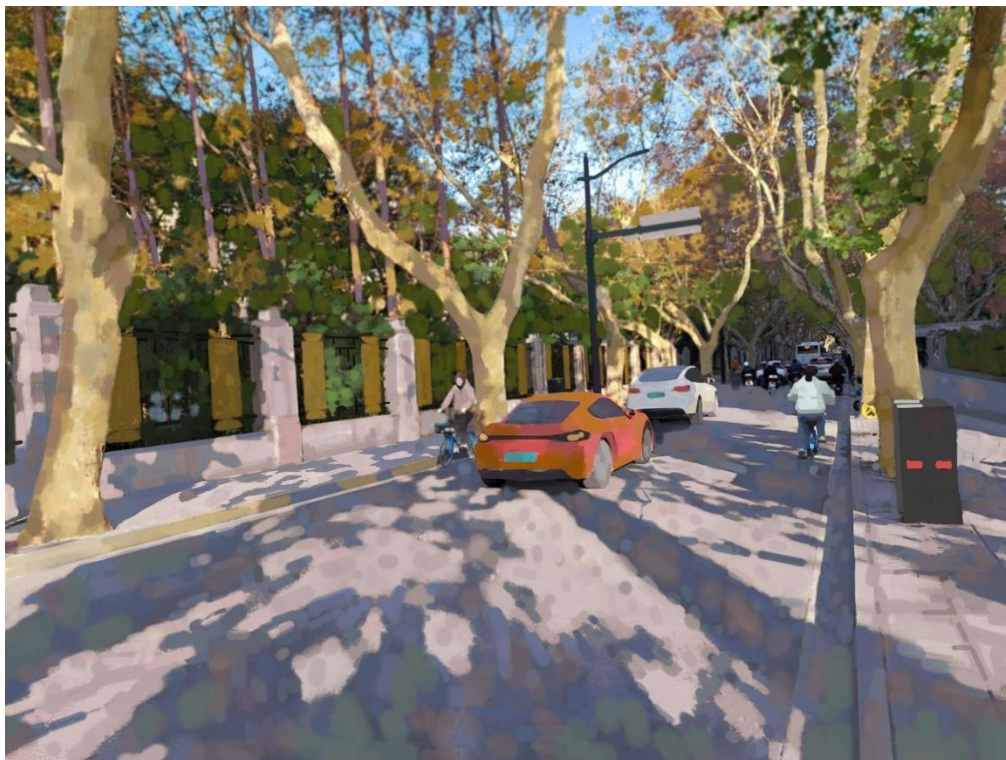


Dianshan Lake, Jazz Scale C major；淀山湖，爵士音阶 C 大调



Huaihai Middle Road under the Sun, Jazz scale C# major；阳光下的淮海中路，爵士音阶 C#大调

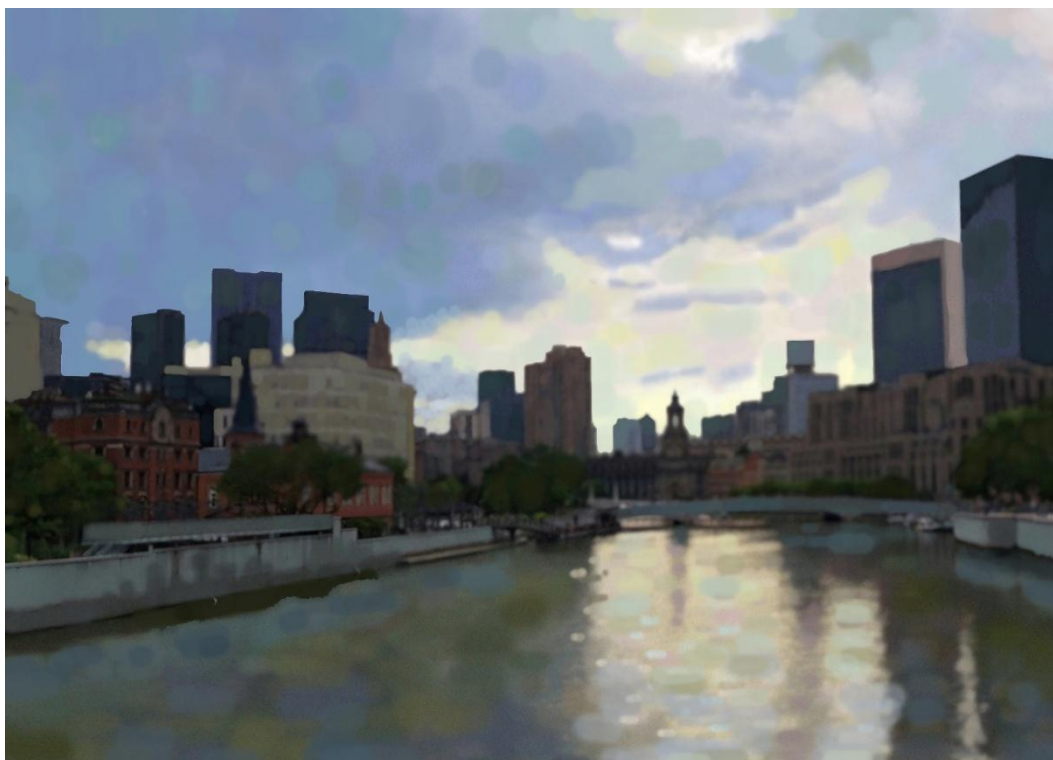




Yueyang Road Chinese Academy of Sciences, Jazz scale C major; 岳阳路中科院，爵士音阶 C 大调



Shanghai Huangpi Road, Jazz scale C major; 上海黄陂路，爵士音阶 C 大调



Suzhou River, jazz scale C major; 苏州河，爵士音阶 C 大调



Morning in Xujiahui, jazz scale C major; 徐家汇的早晨，爵士音阶 C 大调

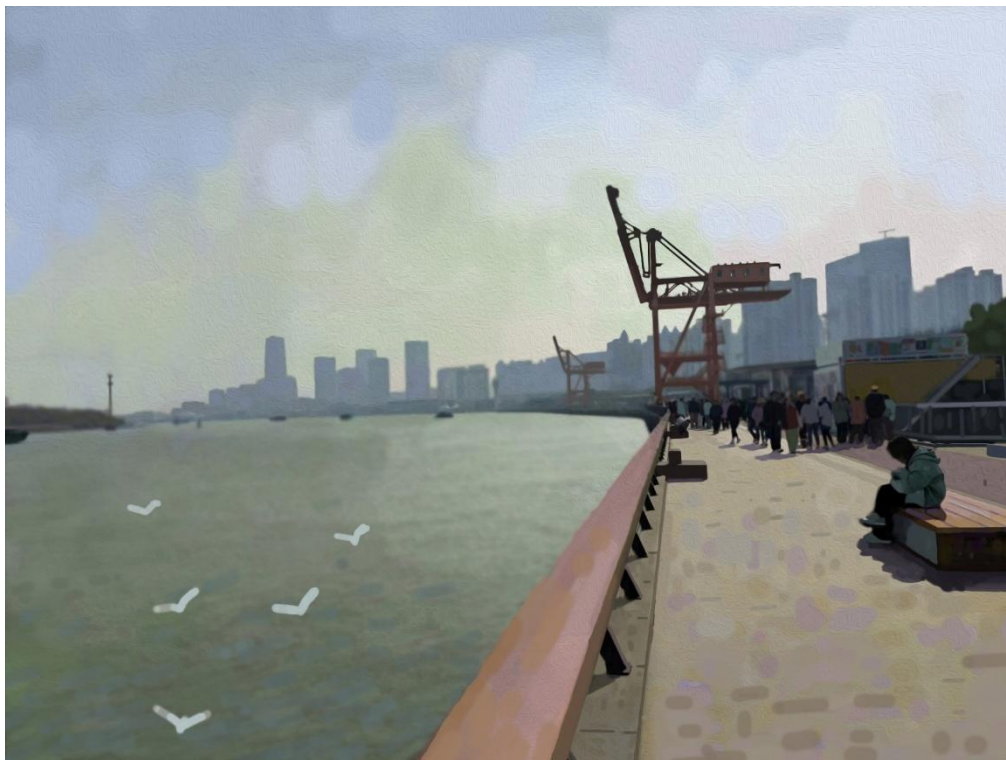




Xu Jiahui, Jazz scale C-sharp major；徐家汇，爵士音阶升 C 大调



Huangpu River, jazz scale C major；黄浦江，爵士音阶 C 大调



West Bund Art District, Jazz Scale C Major；西岸艺术区，爵士音阶 C 大调

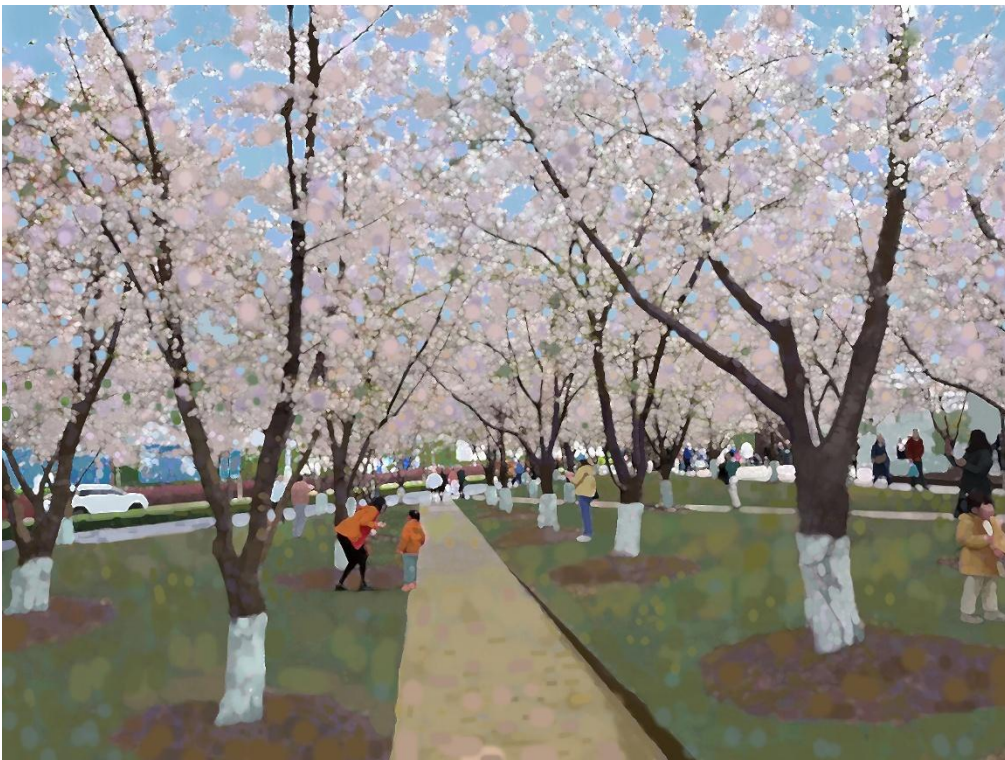


Lupe Bridge, jazz scale C major；卢浦大桥，爵士音阶 C 大调





Xuhui Riverside, Jazz scale C major; 徐汇滨江，爵士音阶 C 大调



Cherry Blossom Forest, Jazz in C Major; 樱花林，爵士 C 大调





Lujiazui, Jazz C major: 陆家嘴，爵士 C 大调



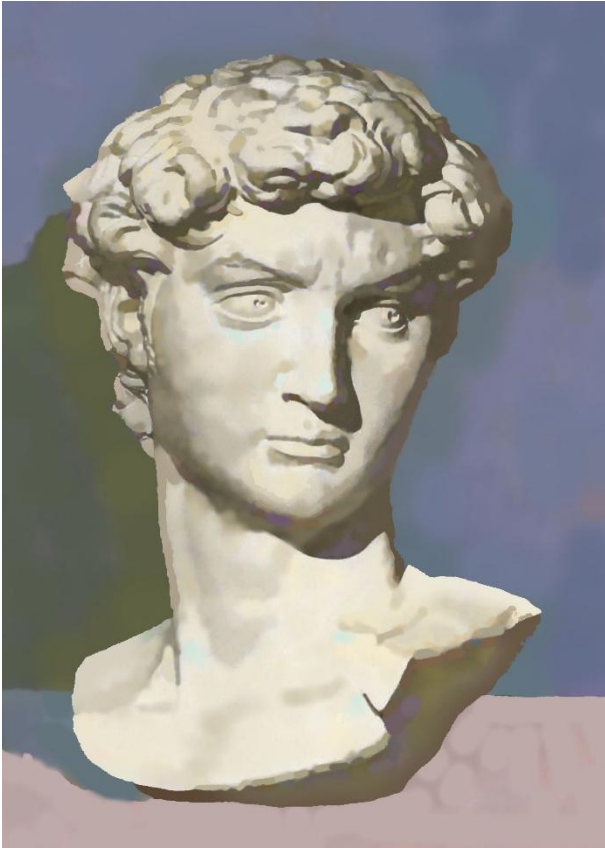
Self-portrait, Jazz scale C major, f# minor | 自画像，爵士音阶 C 大调，f#小调



Self-portrait, Jazz pentatonic scale C major, f# minor | 自画像，爵士五声音阶 C 大调，f# 小调



Self-portrait, Jazz C# major, g minor | 自画像，爵士 C# 大调，g 小调

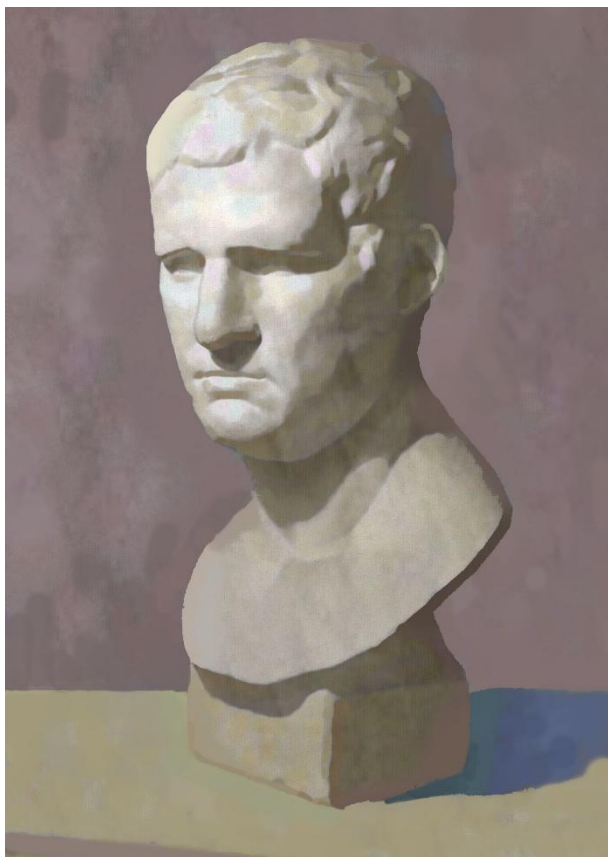


Jazz Scale C major,f-sharp minor; 爵士音阶，C 大调，升 f 小调

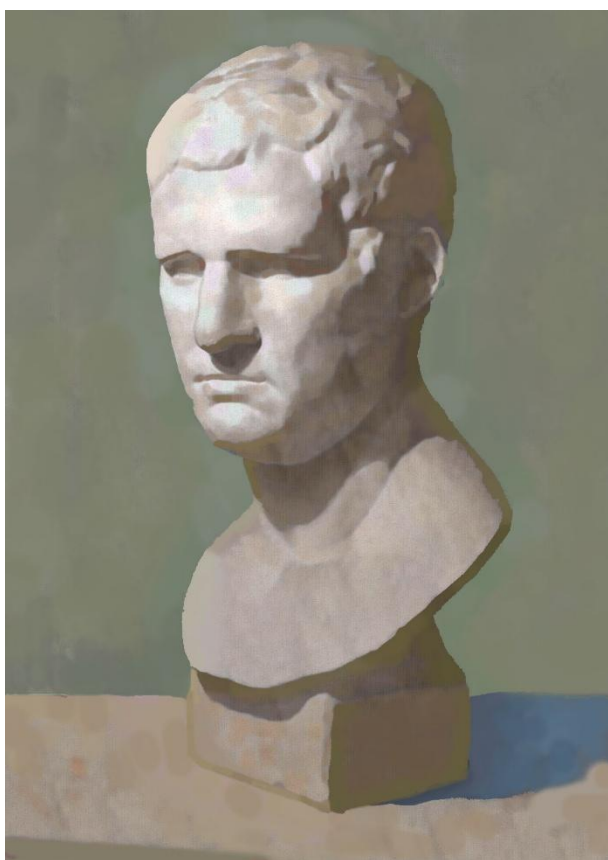


Plaster model,Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g 小调





Plaster model, Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C 大调，升 f 小调



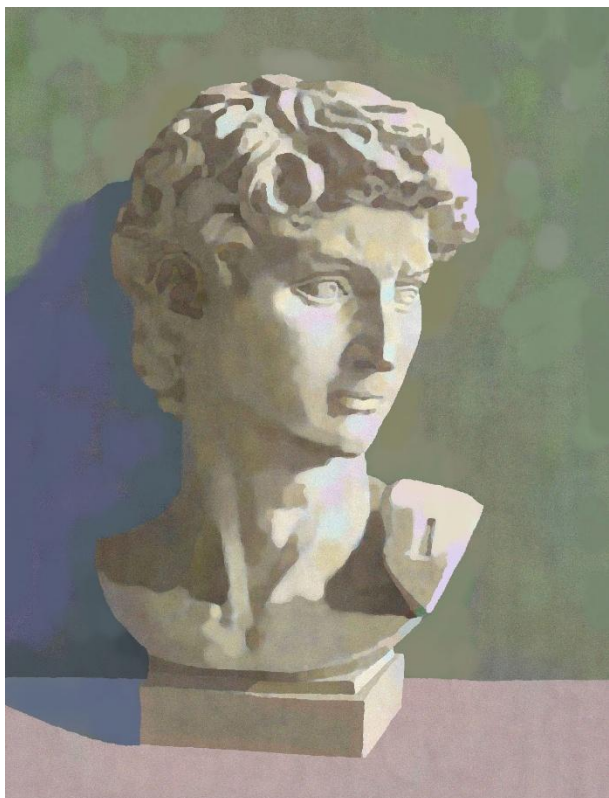
Plaster model, Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g 小调



Plaster model,Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C 大调，升 f 小调



Plaster model,Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g 小调



Plaster model, Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C 大调，升 f 小调



Plaster model, Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g 小调





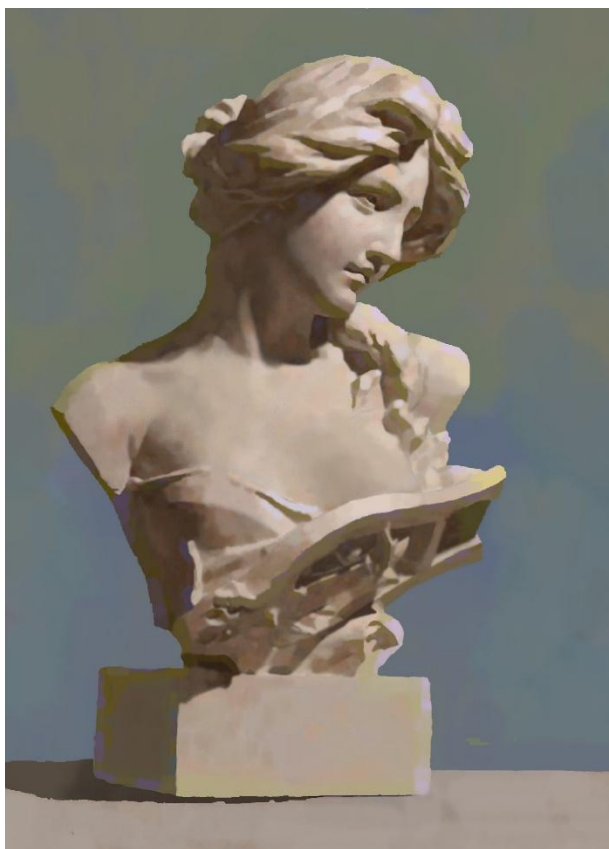
Plaster model, Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C 大调，升 f 小调



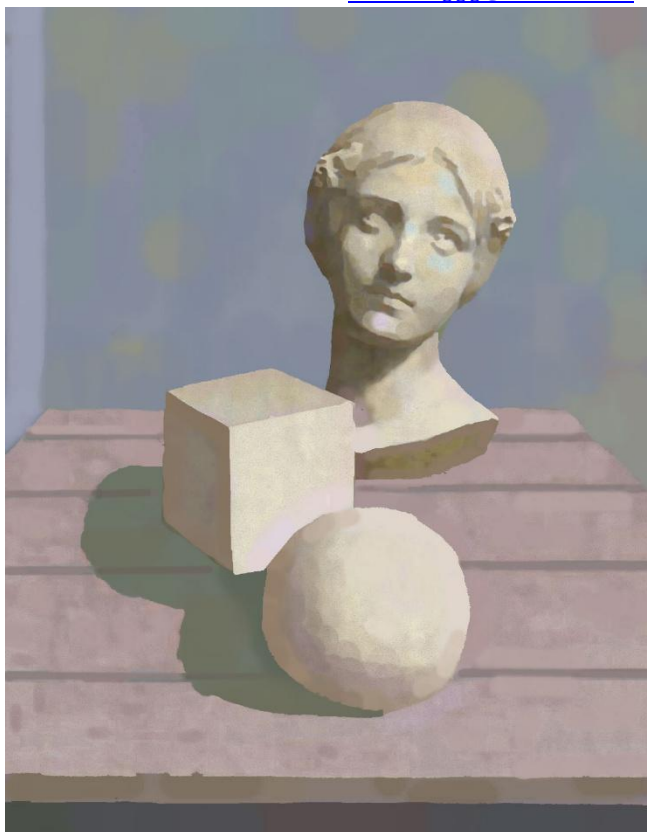
Plaster model, Jazz Scale A major, e-flat minor; 石膏像，爵士音阶，A 大调，降 e 小调



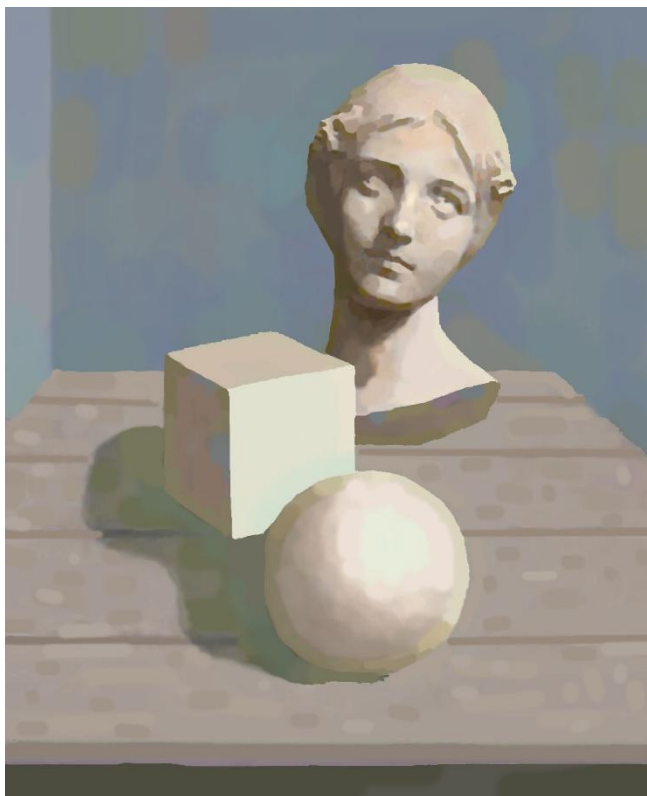
Jazz Scale C major,f-sharp minor；爵士音阶，C 大调，升 f 小调



Plaster model,Jazz Scale C# major, g minor；石膏像，爵士音阶，C#大调，g 小调

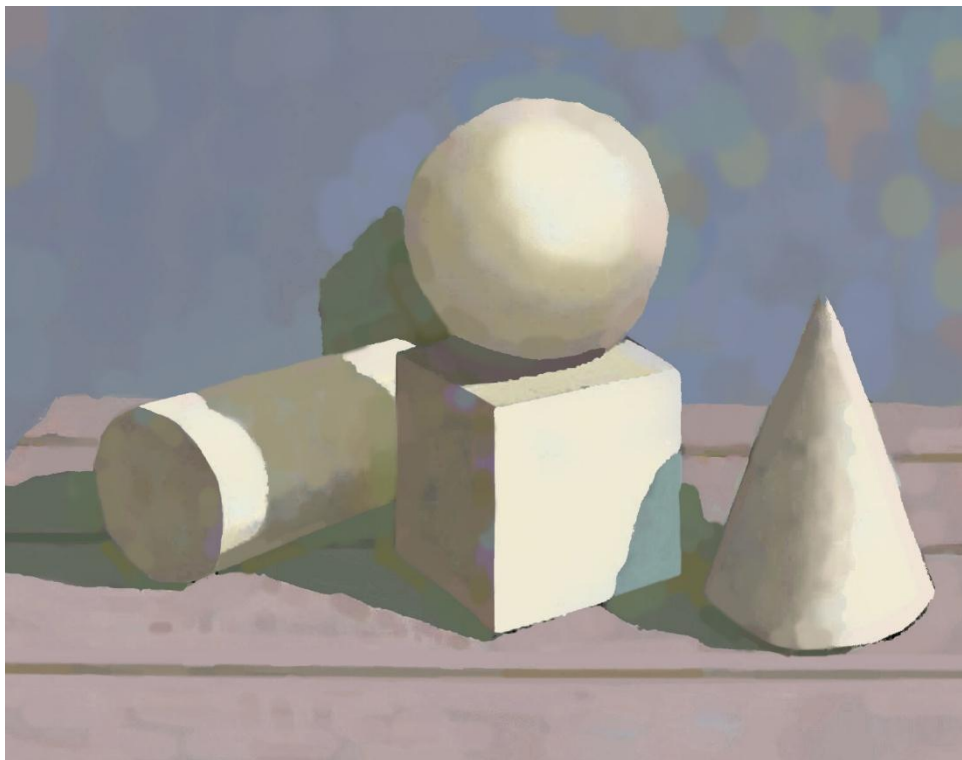


Plaster model, Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C 大调，升 f 小调



Plaster model, Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g 小调





Plaster model, Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C大调，升f小调



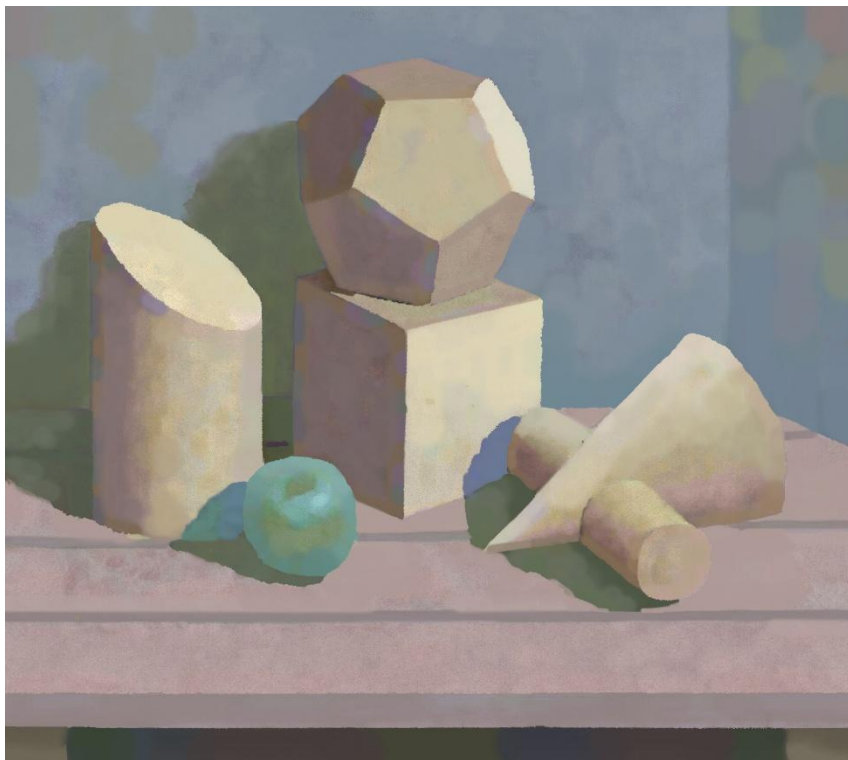
Plaster model, Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g小调



Plaster model,Jazz Scale C major, f sharp minor; 石膏像，爵士音阶，C 大调，升 f 小调



Plaster model,Jazz Scale C# major, g minor; 石膏像，爵士音阶，C#大调，g 小调



Plaster model,Jazz Scale C major, f sharp minor；石膏像，爵士音阶，C 大调，升 f 小调



Plaster model,Jazz Scale C# major, g minor；石膏像，爵士音阶，C#大调，g 小调



### 3. Chromatic | 无调性



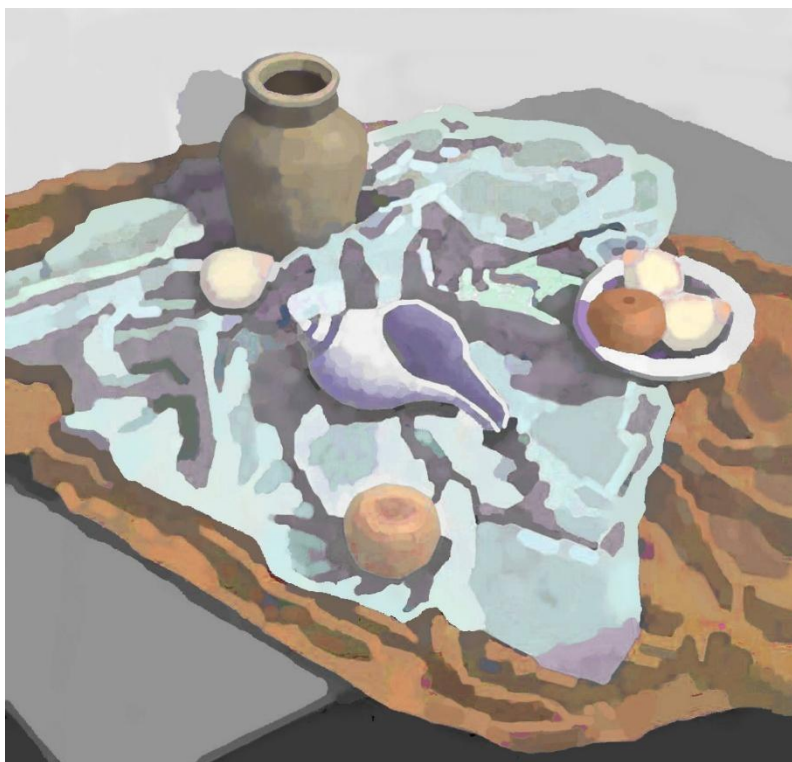
Still life, Atonal; 静物，无调性



Still life, jazz Ab9 chord; 静物，爵士 Ab9 和弦



Still life, jazz A13 chord; 静物，爵士 A13 和弦



Still life, jazz f# 9 chord; 静物，爵士 f# 9 和弦



Still life, jazz C9 chord; 静物，爵士 C9 和弦



Still life, Atonal; 静物，无调性





Still life, jazz Ab9 chord; 静物，爵士 Ab9 和弦



Still life, jazz A12 chord; 静物，爵士 A13 和弦



Still life, jazz g9 chord; 静物，爵士 g9 和弦



Still life, jazz f#9 chord; 静物，爵士 f#9 和弦



Still life, jazz C9 chord; 静物，爵士 C9 和弦



Still life,Atonal; 静物，无调性





Still life, jazz A13 chord; 静物，爵士 A13 和弦



Still life, jazz f#7 chord; 静物，爵士 f#7 和弦



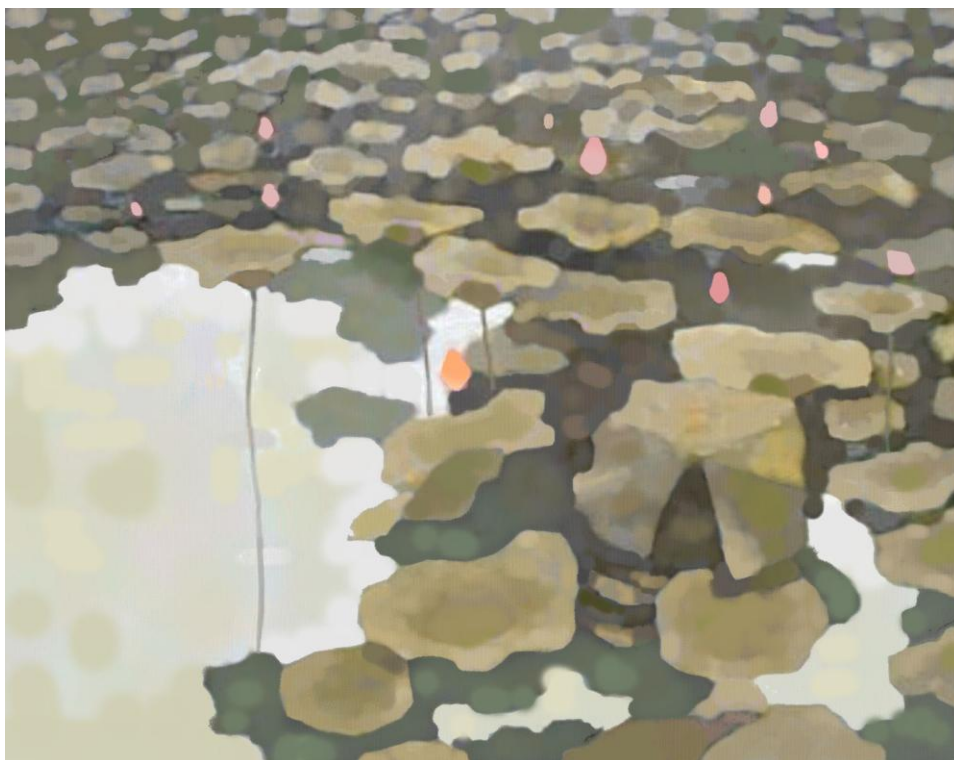
Still life, Atonal; 静物，无调性



River valley, Atonal; 河谷，无调性



Fishing boat, Atonal; 渔舟，无调性



Lotus, Atonal; 荷花，无调性





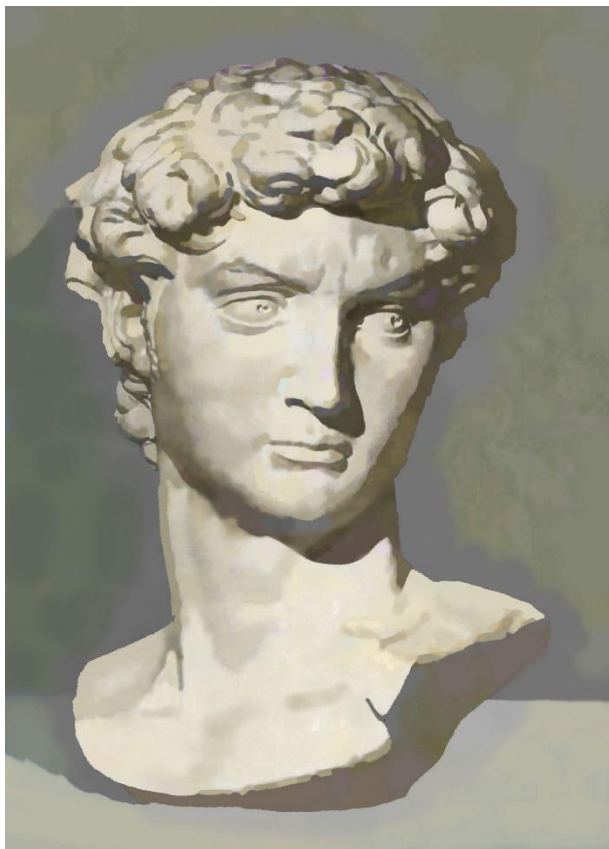
Zhu Jiajiao, Jazz C13 chord; 朱家角，爵士 C13 和弦



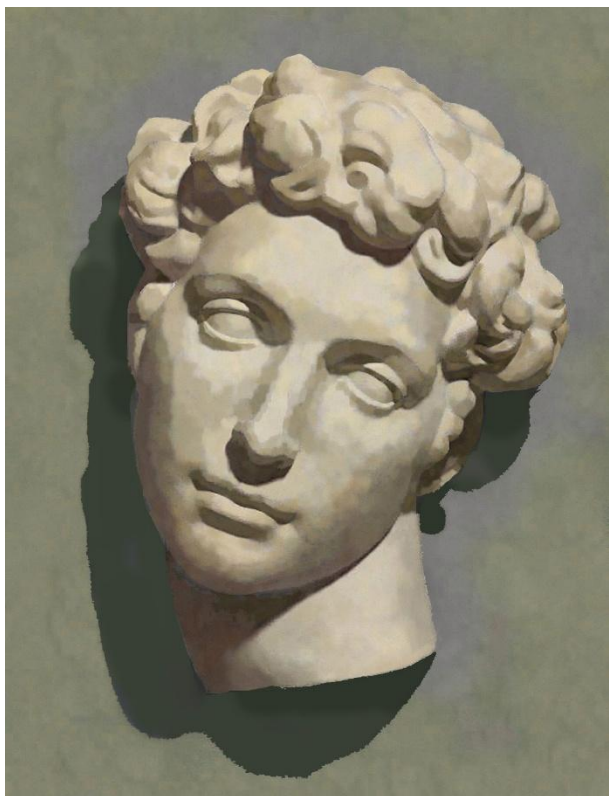
Zhu Jiajiao, Jazz C13 chord; 朱家角，爵士 C13 和弦



Plaster statue,Atonal; 石膏像，无调性



Plaster model,Atonal; 石膏像、无调性



Plaster model,Atonal：石膏像、无调性



## Brief Summary | 小结

和弦是时空，生命，精神的自然编码形式，统一的物理框架。

Chords are the natural coding form of time, space, life, and spirit, a unified physical framework.

人类知识的形成源自两种观察者：

Human knowledge is formed from two kinds of observers:

**和弦观察者：**对和弦作用的观察，如：音乐（时间的表达）、绘画（空间的表达）、经络（生命的表达）。

**Chord Observer:** Observation of the effects of chords, such as music (expression of time), painting (expression of space), meridians (expression of life).

**非和弦观察者：**屏蔽了和弦的作用，其观察产生了物理学、生物学等体系。

Non-chord observer: blocks the effect of chords, and its observation produces systems such as physics and biology.

尽管这两种观察者探索的领域似乎不同，它们实际上都涉及相同的主题：时空与生命。

Although the two observers seem to explore different areas, they actually deal with the same themes: space-time and life.

**认识的边界即观察者的边界。**和弦场（音乐、绘画、经络等）是非和弦观察者的盲区，这产生了一个问题：两种观察者对时空与生命的描述为何不同？谁的视角更接近真相？

**The boundary of cognition is the boundary of the observer.** The chord field (music, painting, meridians, etc.) is the blind spot of non-chord observers, which raises a question: Why do the two observers describe time, space and life differently? Whose perspective is closer to the truth?

本书将持续探索这些问题，基于观察结果进行修正与更新。您的关注与批评是我们不断进步的动力。

This book will continue to explore these issues and make revisions and updates based on the observations. Your attention and criticism are the driving force for our continuous progress.

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作者：李晓虹，中国、四川、宜宾

Author: Li Xiaohong, China, Sichuan, Yibin

预印本地址：

Preprint address:

<https://www.researchgate.net/profile/Xiaohong-Li-17>

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BASIC THEORY OF MUSIC；音乐基础理论

HARMONICS；和声学

GENERAL PHYSICS；普通物理学

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