# *Music Integration Assessment Rubrics*

LTM consultants now develop assessment rubrics that are balanced equally between an emphasis on academic and music skill outcomes. The examples in this section reveal how integration assessment rubrics drawing on the RUBRICS CUBE system can be structured based on the assumption of skill development that is based on fundamental concepts and processes shared across disciplines. Starting with music alone, then combining subject areas (music-language arts listening comprehension; music and map coordinate reading skills), and finally focusing on math learning outcomes provides a sequence of scoring rubrics that combs through the multiple phases of the music matrix project. Additional rubrics were developed specifically for geographic skills and vocabulary assessment, though not featured here.

## MUSIC-LANGUAGE INTEGRATED LEARNING: INDEPENDENT (SOLO) AND GROUP (ENSEMBLE) READING AND LISTENING COMPREHENSION RUBRIC

Weak ——> Strong
1 2 3 4

**1. The Decoding Process: The Translation (Interpretation) of Musical Matrix Coordinates into Musical Performance Through Vocal and Instrumental (String Instrument) Production**

| | |
|---|---|
| ☐ ☐ ☐ ☐ | The reader can perform fluently and accurately common notes and phrases with appropriate diction, solfa syllables,, or instrumental technique. |
| ☐ ☐ ☐ ☐ | The reader uses various strategies for decoding unfamiliar music. |
| ☐ ☐ ☐ ☐ | The reader can perform with dramatic inflection, nuance, appropriate to the characters, setting and syntactical structures of the composition. |

**2. Reading Comprehension and Aesthetic Response**

| | |
|---|---|
| ☐ ☐ ☐ ☐ | The reader/listener can find vivid descriptions that bring the musical composition alive. |
| ☐ ☐ ☐ ☐ | The reader/listener can find places where the author expresses musical ideas clearly, using well-chosen words and phrases. |
| ☐ ☐ ☐ ☐ | The reader/listener can find places where the composer expresses emotions effectively in the music. |
| ☐ ☐ ☐ ☐ | The reader/listener can identify interesting characters and their development within the musical composition. |
| ☐ ☐ ☐ ☐ | The reader/listener can identify places where the writer evokes a particular setting, period, action, or mood in the music. |

**3. Operational and Reflective Understanding of the Composition**

| | |
|---|---|
| ☐ ☐ ☐ ☐ | The reader/listener can identify and describe how a matrix can be used to write and read musical patterns. |
| ☐ ☐ ☐ ☐ | The reader/listener can create, keep track of, and perform new patterns on filled musical matrix. |
| ☐ ☐ ☐ ☐ | The reader/listener can create, keep track of, and perform new patterns on the open musical matrix |
| ☐ ☐ ☐ ☐ | The reader/listener can provide musical details, information, and explanations as needed to demonstrate connection of music reading to the graph. |
| ☐ ☐ ☐ ☐ | The reader/listener can describe how parts of the musical composition work together to create a unified and consistent whole. |
| ☐ ☐ ☐ ☐ | The reader/listener can describe and demonstrate how a graph of a whole musical piece can reveal understanding of musical form and content |

*This rubric is used to rate fundamental parallel concepts and skills in both music and language arts (e.g., the language or music reader is at once a listener and a performer, translator, and interpreter of symbols that arguably have syntactical and semantic content).*





## MUSIC-MATH INTEGRATED LEARNING RUBRIC: PERCEPTION AND PROBLEM SOLVING WITHIN THE ORGANIZATIONAL STRUCTURE AND PATTERNS IN PACHELBEL'S CANON AND ITS APPLICATION TO MAP READING AND SYSTEMS THINKING

Weak ——> Strong
1 2 3 4

**1. Understanding Coordinate Systems**

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|---|---|
| ☐ ☐ ☐ ☐ | The student can identify coordinates on an x and y axis matrix. |
| ☐ ☐ ☐ ☐ | The student can identify patterns mapped onto an x and y axis matrix. |
| ☐ ☐ ☐ ☐ | The student can use a matrix to identify similar patterns represented across diverse dimensions such as music [time sequence, pitch frequency] and geography [east-west, north-south]. |
| ☐ ☐ ☐ ☐ | The student can take a given map, a coordinate system, and data displayed on these representations and create stories based on it. |
| ☐ ☐ ☐ ☐ | The student can elaborate on a data display story by including details, information, and explanations as needed in relation to numbers, distances, time, measurements, intervals, etc. |

**2. Understanding Math Principles**

| | |
|---|---|
| ☐ ☐ ☐ ☐ | The student applies mathematical thinking in coordinate systems toward the design of an object, building, plan, letter, melody, etc. |
| ☐ ☐ ☐ ☐ | The student expresses mathematical ideas and concepts embedded in maps, melodies, clearly, using well-chosen words and phrases. |
| ☐ ☐ ☐ ☐ | The sequence of math procedures used to solve problems related to map reading can be described in a coherent and logical manner. |

**3. The Application of Mathematical Understanding to Solving New Problems**

| | |
|---|---|
| ☐ ☐ ☐ ☐ | The student plans the formulation and solution of solving data reading problems in coordinate systems across various phenomena. |
| ☐ ☐ ☐ ☐ | The student uses several resources for ideas and information about solving a problem. |
| ☐ ☐ ☐ ☐ | The student takes risks by trying out new ideas or techniques in translating one mapping system to another (geography to Battleship game to melody reading). |

*This rubric is used to rate fundamental parallel concepts and skills in both music and math (e.g., the math or music reader must both translate and interpret symbols that are arguably drawing on common understandngs of units, sequence, order, ratio, proportion, duration, etc.). In this LTM unit the rubric can measure the application of music-math skills to reading in other kinds of coordinate systems such as maps or game boards, etc.*