

Golden Ratio

[Translation of Theory - Pitch Language]

Ian Percy

88 piano/orchestral pitches
 Number sequences in specific register
 [0 = A0 and 87 = C8]

♩ = 60 Table 8a & 8b 1st octave [0 = A0, 87 = C8]

Piano *ppp*

8^{2b}

1 0 0 2 1 0 3 2 1 0 5 3 2 1 0 7 4 3 1 10 6 4 2 12 7 5 2

♩ = 60 Table 8a & 8b 2nd octave

Pno. *ppp*

8^{2b}

15 9 6 3 18 11 7 4 3 1 20 12 8 4 23 14 9 5 4 1

♩ = 60 Table 8a & 8b 3rd octave

Pno. *ppp*

8^{2b}

26 16 10 6 4 2 28 17 11 6 5 1 31 19 12 7 5 2 33 20 13 7 6 1 36 22 14 8 6 2

♩ = 60 Table 8a & 8b 4th octave [0 = A0, 87 = C8]

Pno. *ppp*

8^{2b}

38 23 15 8 7 1 41 25 16 9 7 2 44 27 17 10 7 3 46 28 18 10 8 2

♩ = 60 Table 8a & 8b 5th octave [0 = A0, 87 = C8]

25

Pno. *ppp*

8^{vb}

49 30 19 11 8 3 52 32 20 12 8 4 54 33 21 12 9 3 57 35 22 13 9 4 59 36 23 13 10 3

♩ = 60 Table 8a & 8b 6th octave

31

Pno. *ppp*

8^{vb}

62 38 24 14 10 4 65 40 25 15 10 5 67 41 26 15 11 4 70 43 27 16 11 5 72 44 28 16 12 4

♩ = 60 Table 8a & 8b 7th octave

37

Pno. *ppp*

8^{vb}

75 46 29 17 12 5 78 48 30 18 12 6 80 49 31 18 13 5 83 51 32 19 13 6

♩ = 60 Table 8a & 8b 8th octave [0 = A0, 87 = C8]

42

Pno. *ppp*

8^{vb}

86 53 33 86 53 33 20 86 53 33 20 13 86 53 33 20 13 7 6 1

Golden Ratio

Number Sequences within an Octave
[12-tone Language in A]

♩ = 60 Table 10a 1st octave [0 = A]

47

Pno.

1 0 0 2 1 0 3 2 1 0 5 3 2 1 0 7 4 3 1 10 6 4 2 0 7 5 2

♩ = 60 Table 10a 2nd octave [0 = A]

55

Pno.

3 9 6 3 6 11 7 4 3 1 8 0 8 4 11 2 9 5 4 1

♩ = 60 Table 10a 3rd octave [0 = A]

60

Pno.

2 4 10 6 4 2 4 5 11 6 5 1 7 7 0 7 5 2 9 8 1 7 6 1 0 10 2 8 6 2

♩ = 60 Table 10a 4th octave [0 = A]

66

Pno.

2 11 3 8 7 1 5 1 4 9 7 2 8 3 5 10 7 3 10 4 6 10 8 2

♩ = 60 Table 10a 5th octave [0 = A]

71

Pno.

1 6 7 11 8 3 4 8 8 0 8 4 6 9 9 0 9 3 9 11 10 1 9 4 11 0 11 1 10 3

♩ = 60 Table 10a 6th octave [0 = A]

77

Pno.

2 2 0 2 10 4 5 4 1 3 10 5 7 5 2 3 11 4 10 7 3 4 11 5 0 8 4 4 0 4

♩ = 60 Table 10a 7th octave [0 = A]

83

Pno.

3 10 5 5 0 5 6 0 6 6 0 6 8 1 7 6 1 5 11 3 8 7 1 6

♩ = 60 Table 10a 8th octave [0 = A]

88

Pno.

2 5 9 2 5 9 8 2 5 9 8 1 2 5 9 8 1 7 6 1

Golden Ratio

Number sequences as symmetrical interval classes
[Interval-class language in A]

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♩ = 60 Table 10b 1st octave [0 = A]

93

Pno. 

1 0 0 2 1 0 3 2 1 0 5 3 2 1 0 5 4 3 1 2 6 4 2 0 5 5 2

♩ = 60 Table 10b 2nd octave [0 = A]

101

Pno. 

3 3 6 3 6 1 5 4 3 1 4 0 4 4 1 2 3 5 4 1

♩ = 60 Table 10b 3rd octave [0 = A]

106

Pno. 

2 4 2 6 4 2 4 5 1 6 5 1 5 5 0 5 5 2 3 4 1 5 6 1 0 2 2 4 6 2

♩ = 60 Table 10b 4th octave [0 = A]


112

Pno. 

2 1 3 4 5 1 5 1 4 3 5 2 4 3 5 2 5 3 2 4 6 2 4 2

♩ = 60 Table 10b 5th octave [0 = A]

117

Pno. 

1 6 5 1 4 3 4 4 4 0 4 4 6 3 3 0 3 3 3 1 2 1 3 4 1 0 1 1 2 3

♩ = 60 Table 10b 6th octave [0 = A]

123

Pno. 

2 2 0 2 2 4 5 4 1 3 2 5 5 5 2 3 1 4 2 5 3 4 1 5 0 4 4 4 0 4

♩ = 60 Table 10b 7th octave [0 = A]

129

Pno. 

3 2 5 5 0 5 6 0 6 6 0 6 4 1 5 6 1 5 1 3 4 5 1 6

♩ = 60 Table 10b 8th octave [0 = A]

134

Pno. 

2 5 3 2 5 3 4 2 5 3 4 1 2 5 3 4 1 5 6 1

Golden Ratio

Number sequences within an octave
[12-tone language in C]

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♩ = 60 Table 10a 1st octave [0 = C]

139

Pno. 
1 0 0 2 1 0 3 2 1 0 5 3 2 1 0 7 4 3 1 10 6 4 2 0 7 5 2

♩ = 60 Table 10a 2nd octave [0 = C]

147

Pno. 
3 9 6 3 6 11 7 4 3 1 8 0 8 4 11 2 9 5 4 1

♩ = 60 Table 10a 3rd octave [0 = C]

152

Pno. 
2 4 10 6 4 2 4 5 11 6 5 1 7 7 0 7 5 2 9 8 1 7 6 1 0 10 2 8 6 2

♩ = 60 Table 10a 4th octave [0 = C]

158

Pno. 
2 11 3 8 7 1 5 1 4 9 7 2 8 3 5 10 7 3 10 4 6 10 8 2

♩ = 60 Table 10a 5th octave [0 = C]

163

Pno. 
1 6 7 11 8 3 4 8 8 0 8 4 6 9 9 0 9 3 9 11 10 1 9 4 11 0 11 1 10 3

♩ = 60 Table 10a 6th octave [0 = C]

169

Pno. 
2 2 0 2 10 4 5 4 1 3 10 5 7 5 2 3 11 4 10 7 3 4 11 5 0 8 4 4 0 4

♩ = 60 Table 10a 7th octave [0 = C]

175

Pno. 
3 10 5 5 0 5 6 0 6 6 0 6 8 1 7 6 1 5 11 3 8 7 1 6

♩ = 60 Table 10a 8th octave [0 = C]

180

Pno. 
2 5 9 2 5 9 8 2 5 9 8 1 2 5 9 8 1 7 6 1

Golden Ratio

Number sequences as symmetrical interval classes
 [Interval-class language in C]

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♩ = 60 Table 10b 1st octave [0 = C]

185

Pno. 

1 0 0 2 1 0 3 2 1 0 5 3 2 1 0 5 4 3 1 2 6 4 2 0 5 5 2

♩ = 60 Table 10b 2nd octave [0 = C]

193

Pno. 

3 3 6 3 6 1 5 4 3 1 4 0 4 4 1 2 3 5 4 1

♩ = 60 Table 10b 3rd octave [0 = C]

198

Pno. 

2 4 2 6 4 2 4 5 1 6 5 1 5 5 0 5 5 2 3 4 1 5 6 1 0 2 2 4 6 2

♩ = 60 Table 10b 4th octave [0 = C]

204

Pno. 

2 1 3 4 5 1 5 1 4 3 5 2 4 3 5 2 5 3 2 4 6 2 4 2

♩ = 60 Table 10b 5th octave [0 = C]

209

Pno. 

1 6 5 1 4 3 4 4 4 0 4 4 6 3 3 0 3 3 3 1 2 1 3 4 1 0 1 1 2 3

♩ = 60 Table 10b 6th octave [0 = C]

215

Pno. 

2 2 0 2 2 4 5 4 1 3 2 5 5 5 2 3 1 4 2 5 3 4 1 5 0 4 4 4 0 4

♩ = 60 Table 10b 7th octave [0 = C]

221

Pno. 

3 2 5 5 0 5 6 0 6 6 0 6 4 1 5 6 1 5 1 3 4 5 1 6

♩ = 60 Table 10b 8th octave [0 = C]

226

Pno. 

2 5 3 2 5 3 4 2 5 3 4 1 2 5 3 4 1 5 6 1