

ABSTRACT

Title of dissertation: UNFADING ECHOES

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The initial concept of *Unfading Echoes* is to combine the elements of both Western and Eastern music in a profound way; the violin and the Chinese fiddle – “erhu,” are used to symbolize the two cultures. The erhu – a Chinese traditional instrument – is normally tuned to D4 and A4, which is the same as the two middle strings of the violin. Comparing its timbre with the violin’s, the erhu emphasizes higher overtones; its fundamental is weaker than some of the partials, which gives its sound a nasal quality. The traditional Chinese piece for the erhu, “*The Moon Reflected in Er-quan*,” which is often considered one of the most important masterpieces in China, inspired this work in various respects. In small scale, its pitches, melodic contour, and its rhythms are thoroughly utilized in *Unfading Echoes*; in larger scale, the ways of varying theme, the slow pace, the ambiguous edges between sections/phrases have also considerably influenced the design of this piece.

The piece can be divided into three major sections (see table 1 & figure 1). Proportionally, the sum of section I and II is roughly equal to section III; the overall plan also suggests that the contour design reflects quasi-symmetry.

		Time	m.#	Duration (seconds)	Note
I	I(i)	0'00"~1'00"	1-9	60	Detuned violin solo
	I(ii)-1	1'00"~2'00"	10-22	60	Tape enters
	I(ii)-2	2'00"~4'00"	23-43	120	
	I(ii)-3	4'00"~7'00"	44-80	180	
II	II	7'00"~10'00"	81-114	180	
III	III(i)	10'00"~11'30"	115-126	90	Only tape
	III(ii)-1	11'30"~13'17"	127-147	107	Violin cadenza
	III(ii)-2	13'17"~14'52"	148-165	95	Tape re-enters
	III(ii)-3	14'52"~15'39"	166-174	47	
	III(ii)-4	15'39"~16'51"	175-187	72	
	III(iii)-1	16'51"~19'35"	188-217	164	
	III(iii)-2	19'35"~20'14"	218-226	39	
	III(iii)-3	20'14"~20'36"	227-230	22	

Table 1 Time table of *Unfading Echoes*.

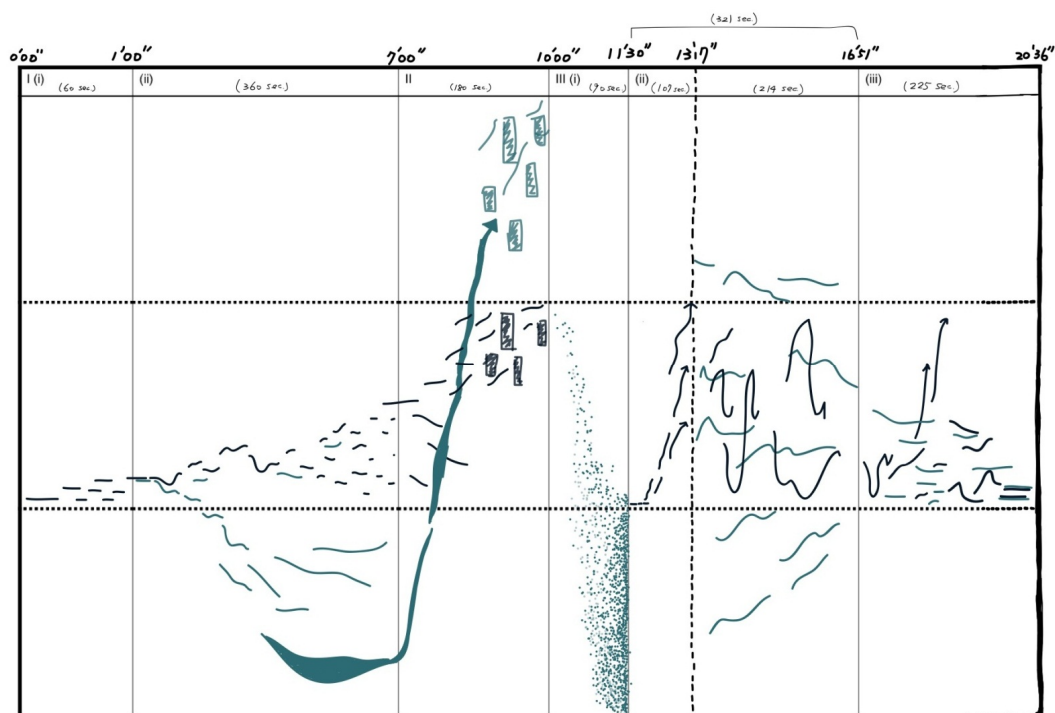


Figure 1 Overall plan (dark – violin, light – tape)

The timbral evolution, mainly established by the tape, includes two phases. From the beginning to 11'30" is a progress of tape splitting from the violin as its extension and eventually draws emphasis on the attack sound, which finally accumulates to white noises. The second phase starts after the violinist's cadenza at 13'17", where the tape shifts its function from a violin's follower or competitor to a main character.

Finally, the two detuned strings at the beginning are designed to relate to the open strings of the erhu. The unusual tuning gives listeners a clue which remains unsolved until its reoccurrence at the end when the intro phrase of *The Moon Reflected in Er-quan* becomes the closing phrase of the whole piece. The idea corresponds to the sense of infinity in Chinese esthetics – endless cycles.

UNFADING ECHOES
for violin and tape

by

Chao-Jung Wu

Dissertation submitted to the Faculty of the Graduate School of the
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of the requirements for the degree of
Doctor of Musical Arts
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Unfading Echoes is dedicated to
my parents, my brother, my husband, and Chun-Hsin Jenny Wu.

Notes

Violin



Two violins are required; one normal tuned and another detuned as:

The piece starts with detuned violin; the violinist should change to specified violin when indicated.

If desired, the soloist may perform m.127~147 with tempo ad lib.; use Version [B] with separated sound-files.

* In m.1~20, play on open strings as much as possible.

* In m.10~20, finger the notes as if playing with normal-tuned violin.

Tape

Version [A]: one stereo sound file, total length: ca. 20'36"

Version [B]: two stereo sound files: a sound engineer or a pedal (if tape is controlled by violinist) is needed to trigger the second clip.

Clip 1 (0'00"~10'00"): starts initially with violinist.

Clip 2 (13'12"~end): starts at m.127 with violinist's cue.

Notation



(square notehead) use left hand tap on fingerboard



approx. pitch



highest pitch on indicated string



wide vibrato (if specified, vibrate with indicated pitch)



behind bridge (on string specified)



snap pizzicato (Bartók pizzicato)



ricochet



accel.



pitch ad lib



short gliss up/down after reach the pitch



longer gliss up/down after reach the pitch

• = 60
 Con sord.

Violin

niente *f* *mp* *fp* *f* *mp* *mf* *pp* *pp* *ppp* *mf* *p* *f*

4 3 3
 Vln. *mp* *pp* Senza sord. *sfz pp* *ff* *pp* *fp* *fp* *fp* *ff*

7
 Vln. *sfz mp* *f* *mf* *mp* *ff* *p* *pp* *f* *mp* *f* *mf* *p*

Time 1'00" 1'07"

10
 Vln. *ppp* *p* *mf* *niente* *niente* *mf*

1'05"
mp

1'02"
 Tape *mp*

1'08"
fp *mf*

IV III II I

Time 1'45" 1'49" 1'53" 1'57" ||

Vln. 19 *mf* *pp* Senza sord. niente *p* niente (4)

1'47" *mp* 1'52" *f* *mf* 1'58" *mp*

Time 2'00" 2'04" 2'09" 2'14"

Vln. 23 * Change to normal tuned violin pizz. *f* arco *f* *mf* *p* *f* *f* pizz. *f*

mf *f* *fp* (echo) 2'10" *mf* 2'17" *p*

2'05" *f*

Time 2'21" 2'28" 2'34"

Vln. 27 *f* *sub. mp* *arco* *mf* *p* *ord.* *ff* *sub. mf* *p* *f* *pizz.*

f *3* (metallic) *f* *3*

Time 2'40" 2'46"

Vln. 30 *mf* *mp* *p* *mf* *f*

arco *mf* *3* *7* *3*

fp *mf* *mf* (gliss down)

Time 252" 257" 301"

Vln. 32 *mp* *f* *ff* (let ring) pizz. *f*

8 *mp* 258" 6 305" *f*

(gliss down) *p* *f*

Time 307" 3'13" 3'19"

Vln. 35 *f* *f* *f* arco *p* *mp* *f* sub. *mf* *fp*

mp *mf* *mp*

321" *f*

Time 3:25" 3:31"

Vln. 38

f *mf* *f*

3:27" *mp* *fp* *p* 3:37"

3:35" *sfz*

Time 3:38" 3:43" 3:50" 3:56"

Vln. 40

mp *p* *mf* *f* *p* *f* *p* *f* *f* *f*

mp *mf*

3:46" (sharp pizzicatos)

2:40" *sfz* 3:43" *fp*

Time 4'00" 4'05" 4'09"

Vln. *arco* *mf* *sub. p* *mp* *sul ponticello* *p* *mf* *ord.* *f* *mp* *pp*

p *mp* *mp*

Time 4'14" 4'21" 4'25"

Vln. *p* *mf* *fp* *mf* *f* *p*

pp (noises) *p* *p*

f *mp* (gliss down)

4'18" 4'28"

Time 4'29" 4'33"

Vln. 50

mp *mf* *f* *mf* *fp*

p *p*

Time 4'38" 4'42"

Vln. 52

mf *p* *mp* *mf* *f*

pizz. *arco* *pizz.* *arco*

(noises)

sfz *>*

Time 4'47" 4'52" 4'56"

Vln. 54

4'48" 4'50" 4'59"

mp *f* *pp* *mp* *f*

p *f* *mf*

Time 5'03" 5'09"

Vln. 57

mf *f* *mf* *f* *mp* *f*

mf *mp* *mf* *f*

Time 5'16" 5'21"

Vln. ⁵⁹ *mp* *mf* *pizz.* *p* *f* *f* *pp*

mp *mf* *f* *p*

(gliss up to C)

Time 5'27" 5'31" 5'35"

Vln. ⁶¹ *mf* *mp* *pp* *f* *mf* *f*

mp *pp* *f* *mf* *f*

mf *mf* *ppp*

f (self-gliss pitch) *mp*

Time 5:39" 5:43" 5:47"

Vln. 64

p *mf* *mp* *ppp* *pizz.* *f* *mf* *f* *mf*

mf *pp* *p* *mp*

Time 5:51" 5:56" 6:00"

Vln. 67

f *arco* *f* *f* *sub. pp* *5/4* *f* *p* *f*

pizz. *mf* *3* *ppp* *p* *mp* *mp* *mf*

f

Time 6'05" 6'10" 6'14" 6'18" 6'22"

Vln. ⁷⁰ *mf* *f* *sub. p* *p* *mp* *p* *f* *pizz.* *f* *arco* *mp* *p*

mf *mp* *p* *mf* *f* *6'24"* *mf*

p *6'07"* *p*

Time 6'26" 6'31" 6'37"

Vln. ⁷⁵ *mf* *f* *f* *mp* *mf* *f* *mf* *sub. p* *f*

mf *mp* *mf* *f* *mf* *pizz.* *mf* *mp*

mp *mf* *5'33"* *mf* *pizz.* *mf* *mp*

mf *p*

Time 6'43" 6'49" 6'55"

Vln. 78 *mp* *mf* *f* *p* *mf* *ff* *pp* *ord.* *mp*

6'44" *mp* *pizz* *arco* *mf* *mp* *sfz* *mp*

Time 7'00" 7'06" 7'12" 7'17"

Vln. 81 *niente* *mf* *sub. p* *mf* *mf* *mp* *f* *mp* *ord. press hard ord.*

7'10" *mf* *7'13"* *7'14"* *(gliss up)*

mf *mp* *mf*

Time 7'22" 7'26" 7'31" 7'36"

Vln. ⁸⁵

f *pp* *ppp* *mf* *p* *f*

(gliss up) 7'41"

7'25" *mf* 7'29" *mf* 7'38" *mf*

Time 7'42" 7'48" 7'55"

Vln. ⁸⁹ arco

mp *f* *p* *mf* *f* *p* *f* *ppp* *mp* *f* *mp*

7'45" pizz. *mf* *f* *mf* 7'50" *mf* (gliss up) *f*

Time 8'02" 8'09" 8'13" 8'19"

Vln. 92

ord. press hard ord.

mf *f* *sfz sub. mp* *ppp* *mp* *f* *p*

8'07" *mf* *f*

8'11" *mf* *p*

8'14"

mf

Time 8'23" 8'27" 8'31" 8'36"

Vln. 96

f *mf* *mf* *f* *mp* *f* *fff* *f* *mp* *mf* *p*

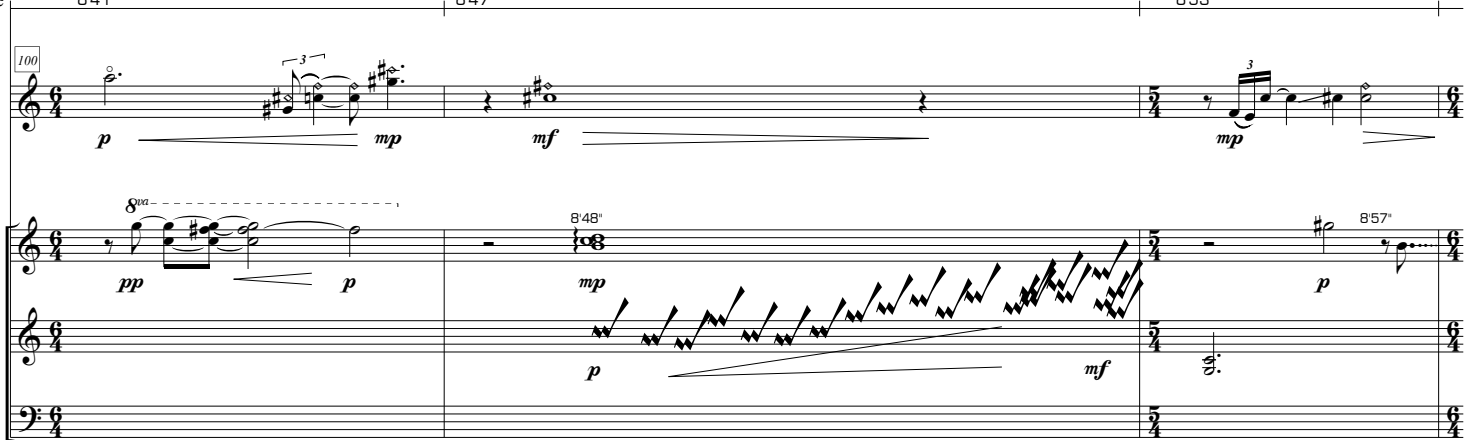
pizz. arco non Vibrato

8'30" *ff* pizz. *mf* *p*

mf *f*

Time 8'41" 8'47" 8'53"

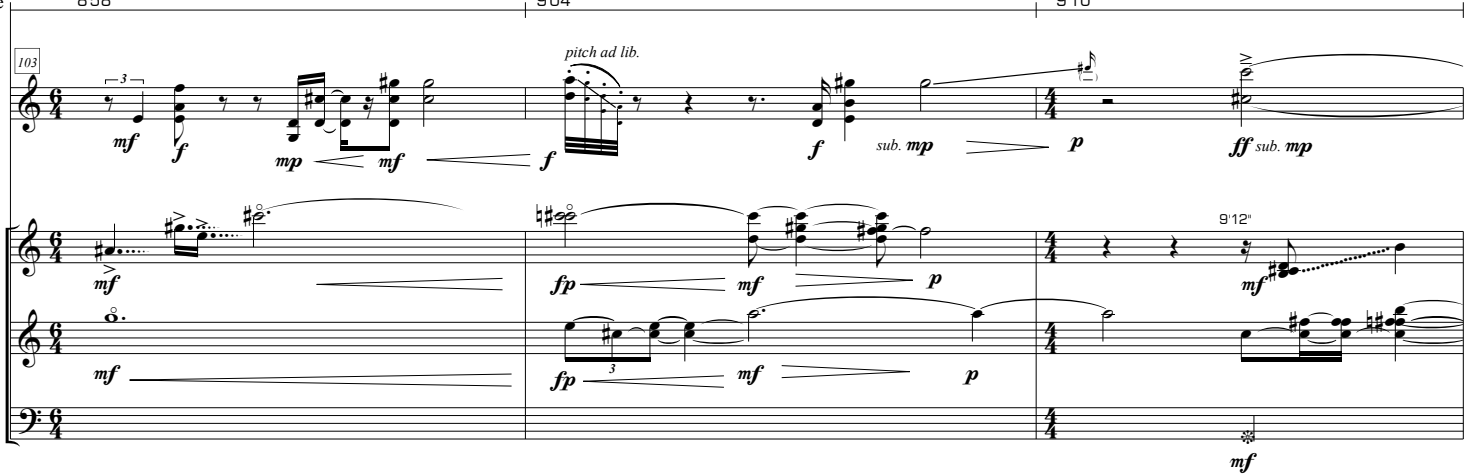
Vln. 100



Violin part (Vln.) starts at 8'41" with a half note G4 (p), followed by a triplet of eighth notes (A4, B4, C5) (mp), and a half note D5 (mf). At 8'47", there is a whole note E5 (mf). At 8'53", there is a triplet of eighth notes (F5, G5, A5) (mp).
 Piano part (Piano) starts at 8'41" with a half note G4 (pp), followed by a half note A4 (p). At 8'47", there is a whole note chord (G4, A4) (mp). At 8'53", there is a half note G4 (p).
 The piano part includes a dense tremolo in the right hand starting at 8'47" and a half note G4 in the left hand.

Time 8'58" 9'04" 9'10"

Vln. 103



Violin part (Vln.) starts at 8'58" with a triplet of eighth notes (G4, A4, B4) (mf), followed by a half note C5 (f). At 9'04", there is a half note D5 (mp), followed by a half note E5 (mf), and a half note F5 (f). At 9'10", there is a half note G5 (sub. mp), followed by a half note A5 (p), and a half note B5 (ff sub. mp).
 Piano part (Piano) starts at 8'58" with a half note G4 (mf). At 9'04", there is a half note chord (G4, A4) (fp), followed by a half note B4 (mf), and a half note C5 (p). At 9'10", there is a half note D5 (mf), followed by a half note E5 (p), and a half note F5 (mf).
 The piano part includes a triplet of eighth notes in the right hand starting at 9'04" and a half note G4 in the left hand.

Time 9'14" 9'18" 9'23"

Vln. *106*

f *mp* *mf* *mp* *mf*

pp *mp* *mf* *mp*

9'16" 9'27"

mp

Time 9'27" 9'33"

Vln. *109*

f *p* *mp* *mf* *f*

mp *mf* *f*

9'32"

f

Time 9'38"

Vln. 111

Violin part: *mp* *sub. f* *mf* *mp* *f*

Piano part: *mp* *f* *mp*

Time 9'44"

Time 9'41"

Time 9'45"

Vln. 112

Violin part: *f* *ff* *mf* *ff* *mf* *f* (ord.) *f* (let ring)

Piano part: *mp* *mp*

Time 9'51"

Time 9'56"

Time 10'00" 10'10"

Vln. 115

pizz.

mf

Time 10'18" 10'24" 10'29"

Vln. 117

mf

p

mf

Time 10:34" 10:40" 10:48"

Vln. 120

sf

Time 11:00" 11:08" 11:15" 11:22"

Vln. 123

mf

(white noise)

(white noise)

Vln. 142

ff *mf* *mp* *mf* *p* *mf*

Vln. 143

f *mp* *ff* *ff* *ff* *fp* *ff*

Vln. 145

f *ric.ord.* *ric.ord.* *3* *5* *Cue Clip 2*

Time Ver. [A] 13'12" 13'17" 13'24" 13'27"

Ver. [B] 0'00" 0'05" 0'12" 0'15"

Vln. 147

a tempo *sfz sub. p* *f* *mp* *mf* *f* *mp* *f* *mp* *press hard ord.*

mp *mf* *p*

mf

22

Time 13:32" 020" 13:38" 026" 13:42" 030"

Vln. 151 *fp* *f* *sub. mp* niente

13:35" 023" *mf* *f* *mp* *f* 13:40" 028"

(metallic) *f*

Time 13:46" 034" 13:53" 041"

Vln. 154 *mf* *mf* *mp* *mf* *f*

f *mp* *mp* *f*

13:47" 035"

Time 14'05" 053"

Vln. *ric.ord.* *ff* *f* *ff* *ord.* *sfz* *mp* *p* *f*

sul ponticello

14'01" 0'49" *mf* 14'06" 0'54" *pizz.* *mp* 14'08" 0'56" *mf*

mf

Time 14'13" 1'01" 14'19" 1'07" 14'26" 1'14"

Vln. *sul tasto* *p* *ord.* *mp* *mp* *mf* *f* *trem.* *ord. sul ponticello* *ff* *pp*

mf *p* *mf* *p* *mp* *fp*

Time 14:57" 14:55" 15:02" 15:00"

Vln. *mf* *f* *mp* *f* *f* *sub. p* *mf* *f*

mp *mf* *fp*

Time 15:08" 15:06" 15:13" 201" 15:17" 205"

Vln. *f* *mf* *fp* *f* *mf* *f* *sub. p*

mp *p* *mp* *f*

Time 15:23" 2:11" 15:30" 2:18"

Vln. *f* *p* *p* *f* niente *mf*

15:25" 2:13" *mp* *mf*

15:29" 2:17" *mf* *p* *f* *mf*

Time 15:34" 2:22" 15:39" 2:27" 15:43" 2:31"

Vln. *mp* *mf* *p* *mf* *mp* *mf* niente <

wide vibrato gradually wide vibrato ord.

15:35" 2:23" *mf* *f* *mp* *f* *mp* *mf*

15:42" 2:30" *f* *mf*

15:46" 2:34" *mf*

15:47" 2:35" *mp*

Time 15:49" 2:37" 15:55" 2:43"

Vln. 177 tremolo crooked bow l.h., ord. pizz. arco ord. 3

f *mp* *mf*

15:53" 2:31" 5 *mf*

15:57" 2:45" *mp*

mf *mf*

Time 16:02" 2:50" 16:07" 2:55" 16:13" 3:01"

Vln. 179 *p* *mf* *ff* *mp* *ppp* *ff* *ord.* *mp* *f* 6

pizz. *mf* 3 3 *f* *mp*

sfz *fp*

Time 16'20" 308" 16'24" 3'12" 16'31" 3'19" 16'36" 3'24"

Vln. 182

mf *f* *fp* *f* *mf*

fp *fp* *fp*

p

fp

16'35" 3'23"

Time 16'40" 3'28" 16'45" 3'33" 16'51" 3'39"

Vln. 186

p *f* *f* *sub. mp* *p* *fp*

mp *fp* *mf* *p* *f*

gliss up

16'50" 3'38"

Time 16'56" 3'44" 17'01" 3'49" 17'06" 3'54"

Vln. 189 *ord. sul ponticello* *ord. sul ponticello* *ord.*

ff *mf* *f* *sfz p* *ff* *f*

17'09" 3'57" *pizz.* *f*

mf *mp* *f* *f*

Time 17'11" 3'59" 17'16" 4'04" 17'21" 4'09"

Vln. 192 *f p* *ff* *mf* *sub. pp*

approx. pitch *gliss tr. between Eb*

p *f* *mp*

17'19" 4'07" *f* *fp*

Time 17:26" 4'14" | 17:31" 4'19"

Vln. 195

wide vibrato (Ab)

ff *fp* *ff* *mp* *sfz* *mp* *f* *f* niente

17:29" 4'17" *fp* *mf*

Time 17:36" 4'24" | 17:41" 4'29" | 17:46" 4'34"

Vln. 197

sul A

ff *mp* *mf* *f* *ff* *mf* *p* *ff*

17:44" 4'32" *f* *mf* *mf* *mp*

Time 17'52" 4'40" | 17'57" 4'45"

Vln. *sub. mp* *p* *mf* *fp* *ff*

ord. sul ponticello

Time 18'03" 4'51" | 18'09" 4'57" | 18'14" 5'02"

Vln. *ff* *mf* *sfz sub. p* *ff*

Ricochet ord.

Time 18'17" 505" 18'23" 5'11" 18'29" 5'17" 18'35" 5'23"

205

wide vibrato

Vln. *pp* *cresc.* *f* *ff* (let ring)

mf *f* *mf* *mp* *p* *p* *mf* *ff* *mf* *p* *mf*

18'32" 5'20"

5

Time 18'42" 5'30" 18'47" 5'35"

209

* Change to detuned violin.

Vln.

mf *mp* *mf* *8va*

18'50" 5'38"

5 7 7

Time 18'53" 5'41" 19'00" 5'48" 19'05" 5'53"

Vln. 211

pp *fp* *f* *f* *pizz.* *arco* *sub. p* *f* *f*

mf *ff* *mp* *mp* *mf* *pp* *mf* 19'02" 5'50" *mf*

mp *mp*

Time 19'11" 5'59" 19'15" 6'03" 19'19" 6'07" 19'24" 6'12"

Vln. 214

ff *mp* *f* *f* *sfz* *sub. mp*

mf *fp*

Time 19'28" 6'16" 19'35" 6'23" 19'40" 6'28"

Vln. 2/8 *f* sul tasto ponticello ord. *sub. p* ric. ...ord. *f* *mf* 3 *ff*

p *p* *fp* *fp* *fp* *f* *mp*

Time 19'44" 6'32" 19'48" 6'36" 19'52" 6'40" 19'57" 6'45"

Vln. 22/ ord. *f* 3 (gliss up after trill) *fff* (highest pitch) Ricochet ord. (let ring) *ff* (Roll from string I and II to III and IV.)

mf *mp* *f*

Time 1958" 646" 2003" 651" 2009" 657"

Vln. 224 ric.ord. wide vibrato mf f p ff fp (ppp) mf ff sfz sub. p

on bridge. slow bow.

f

Time 2014" 702" 2019" 707" 2024" 712" 2029" 717"

Vln. 227 (on bridge. slow bow.....) gradually ord. p mf sub. p p ff (let ring)

mf mp ff

fp