wacom/transducer/piano instrument

on top of the piano sits a multi-touch wacom tablet fitted with a tactile surface in a simplar pattern to a two manual keyboard. the finger motions are sent into a computer running max/msp used as an impulse sound source for signals sent from the computer through four tranducers sitting on the strings of the piano. see also the technical layout desrciption for more indepth layout. the wacom part is the central electronics source in the piece.

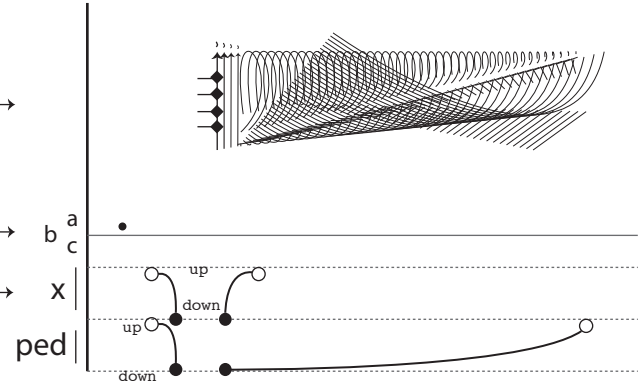
graphic notation is used in the wacom/piano part to visually describe the resulting sound as well as the gesture of the fingers, hands and arms on the tablet surface. in general, lines which are more vertical in orientation are used for more dry staccato like textures, while sounds that have more continuty (e.g. longer FM sounds) have more of a horizontal orientation. the approximate vertical center of a shape indicates a relative pitch, and the relative height/size of a shape indicates its intensity, and granular density.

graphic notation aims to describe the gesture of the hands/arms as well as the resulting sound →

three sound types per section preset →

synthesis/feedback crossfade →

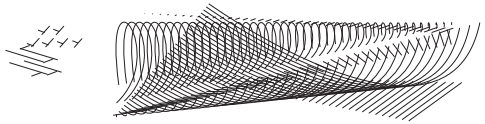
piano sustain pedal →



distorted test-tone beep

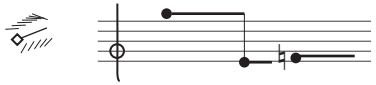
basic sound types:

a



dry, percussive granular sounds

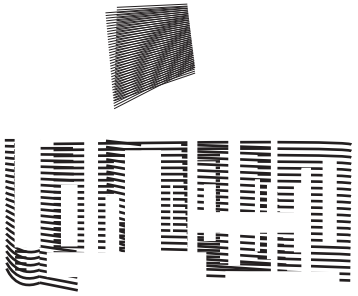
b



pitched, or semi pitched granular sounds.

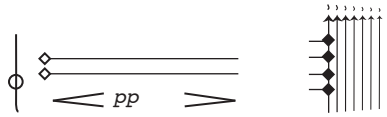
for notated pitches, keyboard range is from C below middle C, to C above the staff.

c



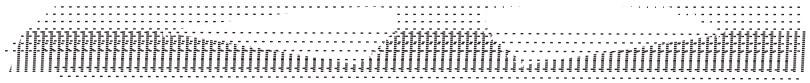
highly modulated, more continuous FM sounds

x



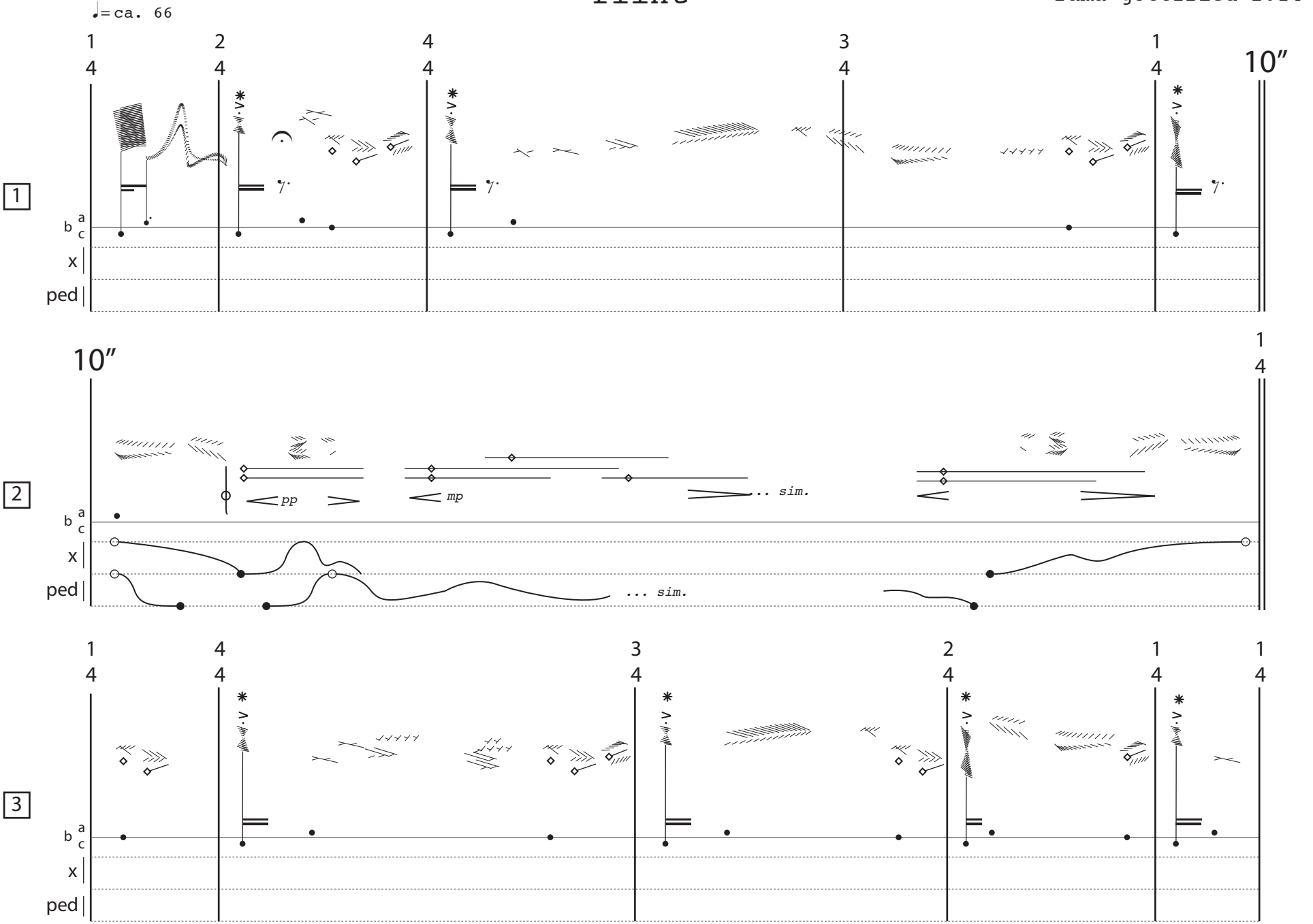
extreme feedback pitches to the point that the transducers jump up and down on the strings

recording of a large group of people talking filtered with wacom interface and played into transducers into the piano

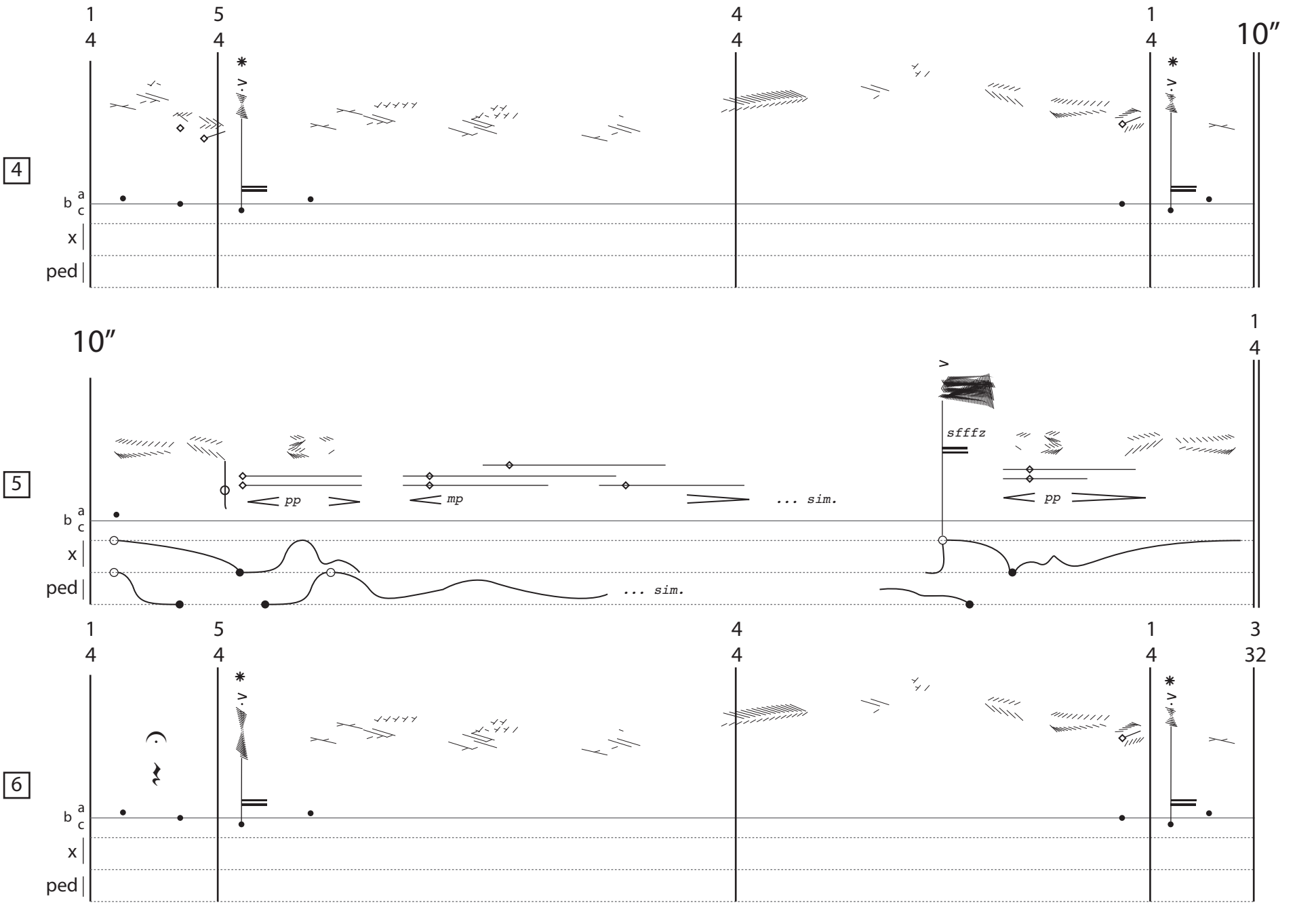


flint

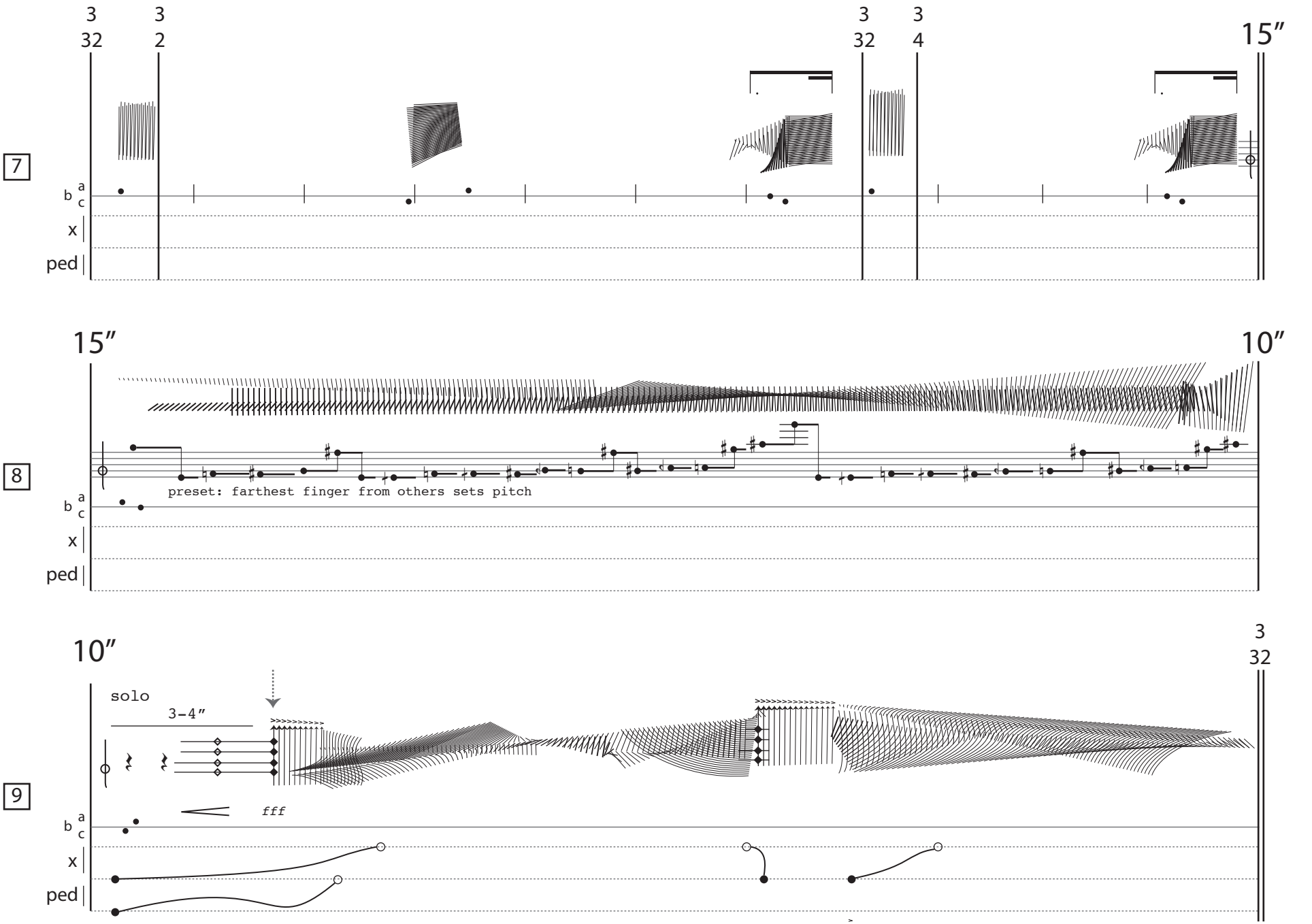
rama gottfried 2014



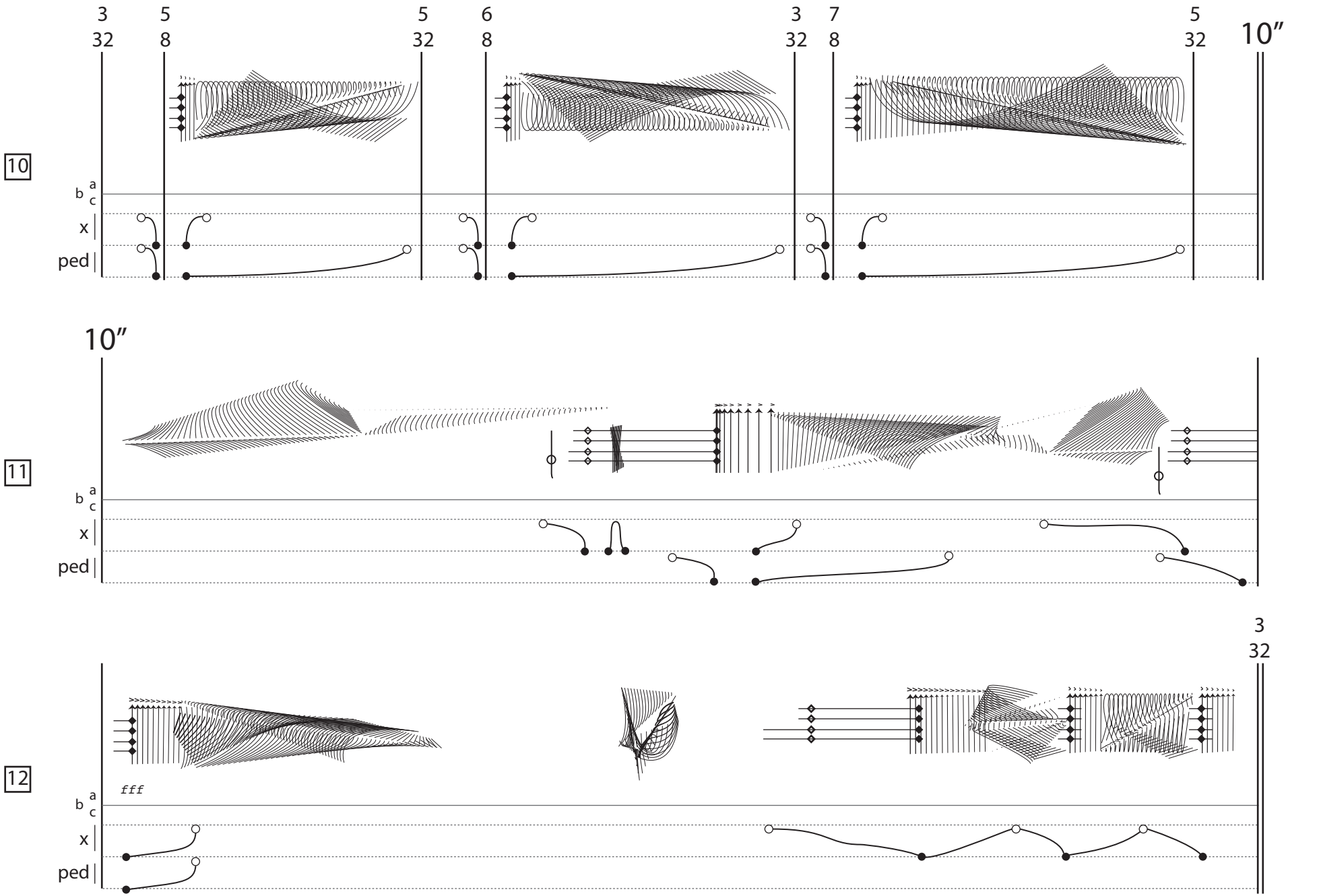
piano: 1



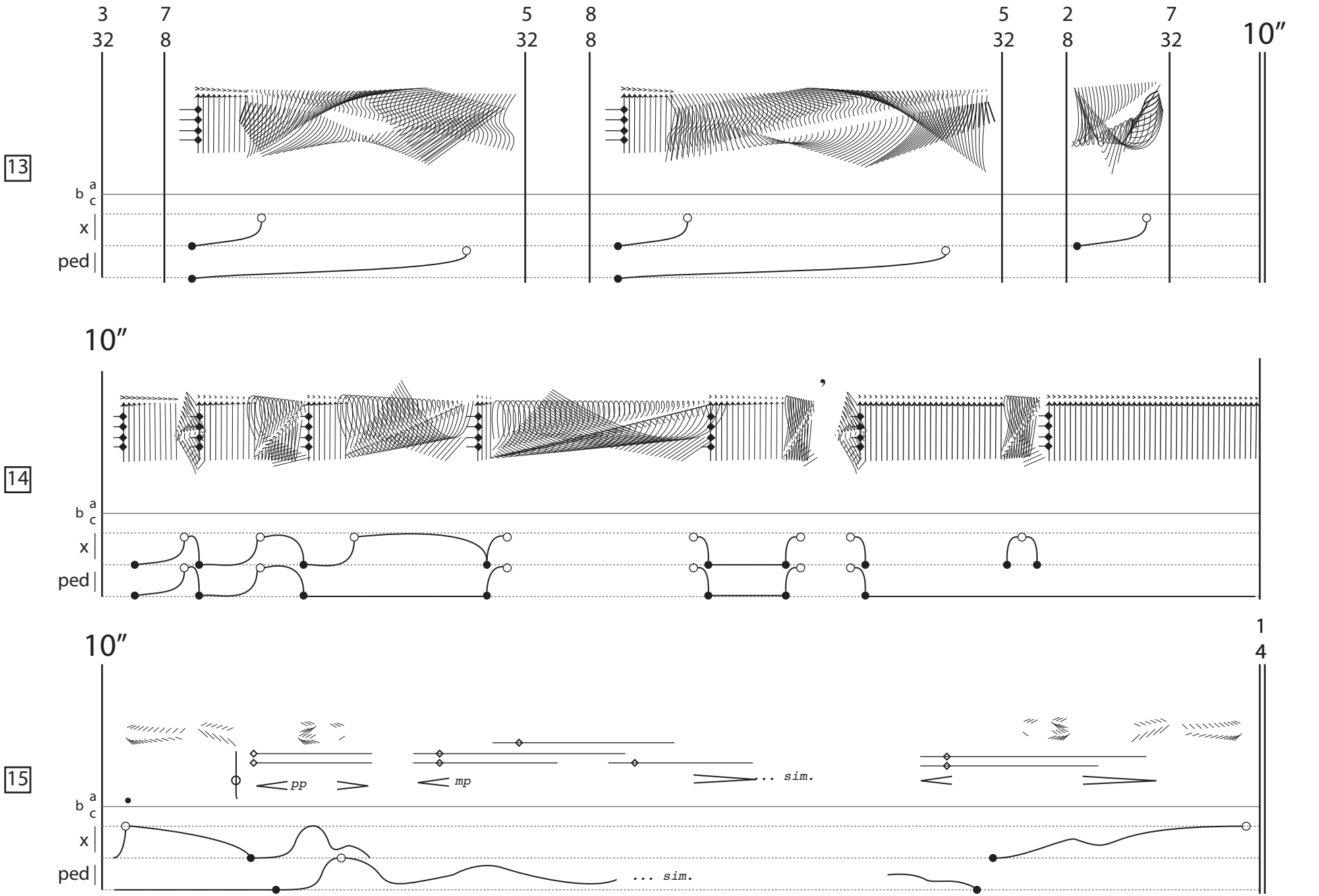
piano: 2

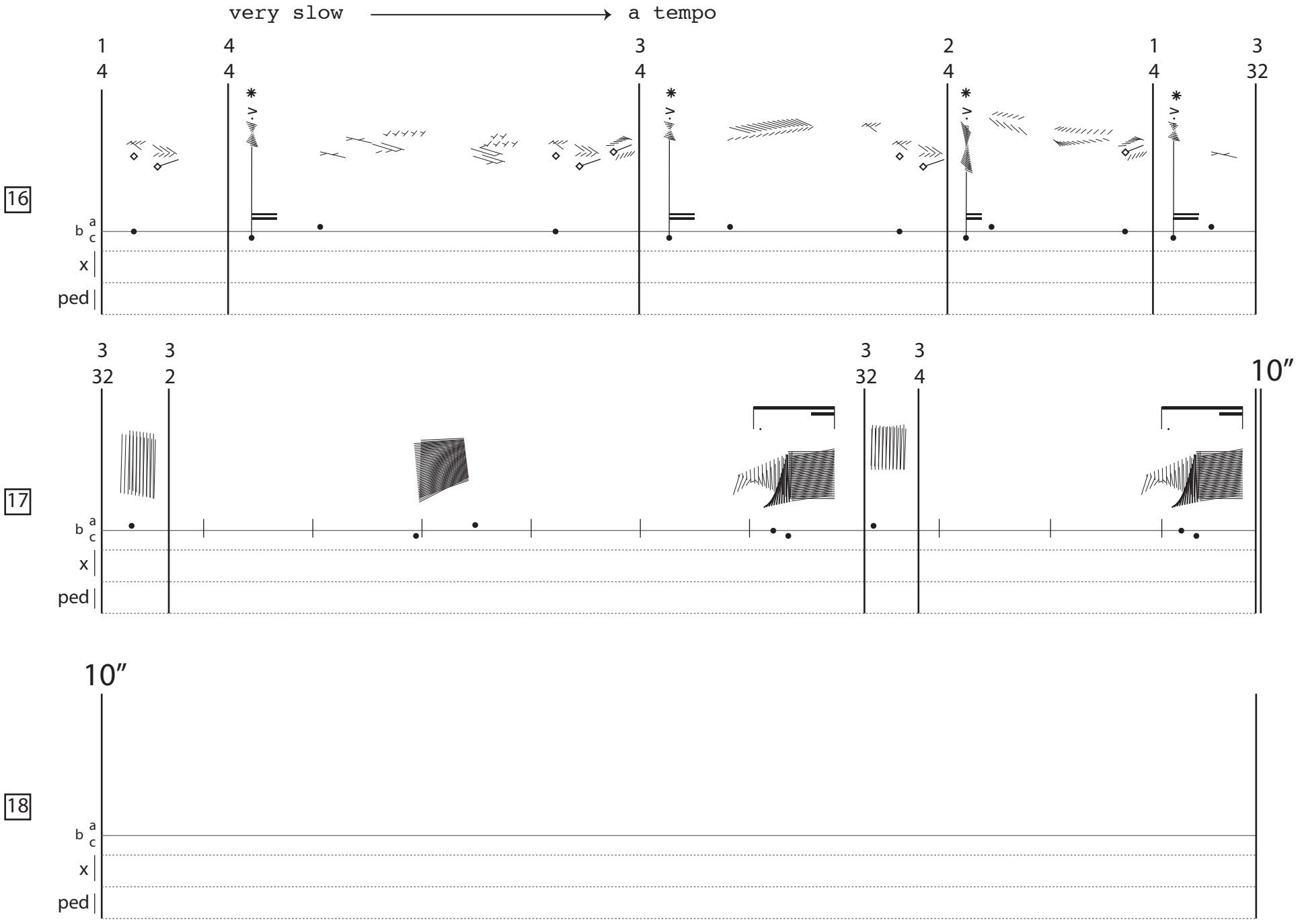

3
32
3
2
3
32
3
4
15″
7
b a
c
x
ped
15″
10″
8
preset: farthest finger from others sets pitch
b a
c
x
ped
10″
3
32
solo
3-4″
9
fff
b a
c
x
ped

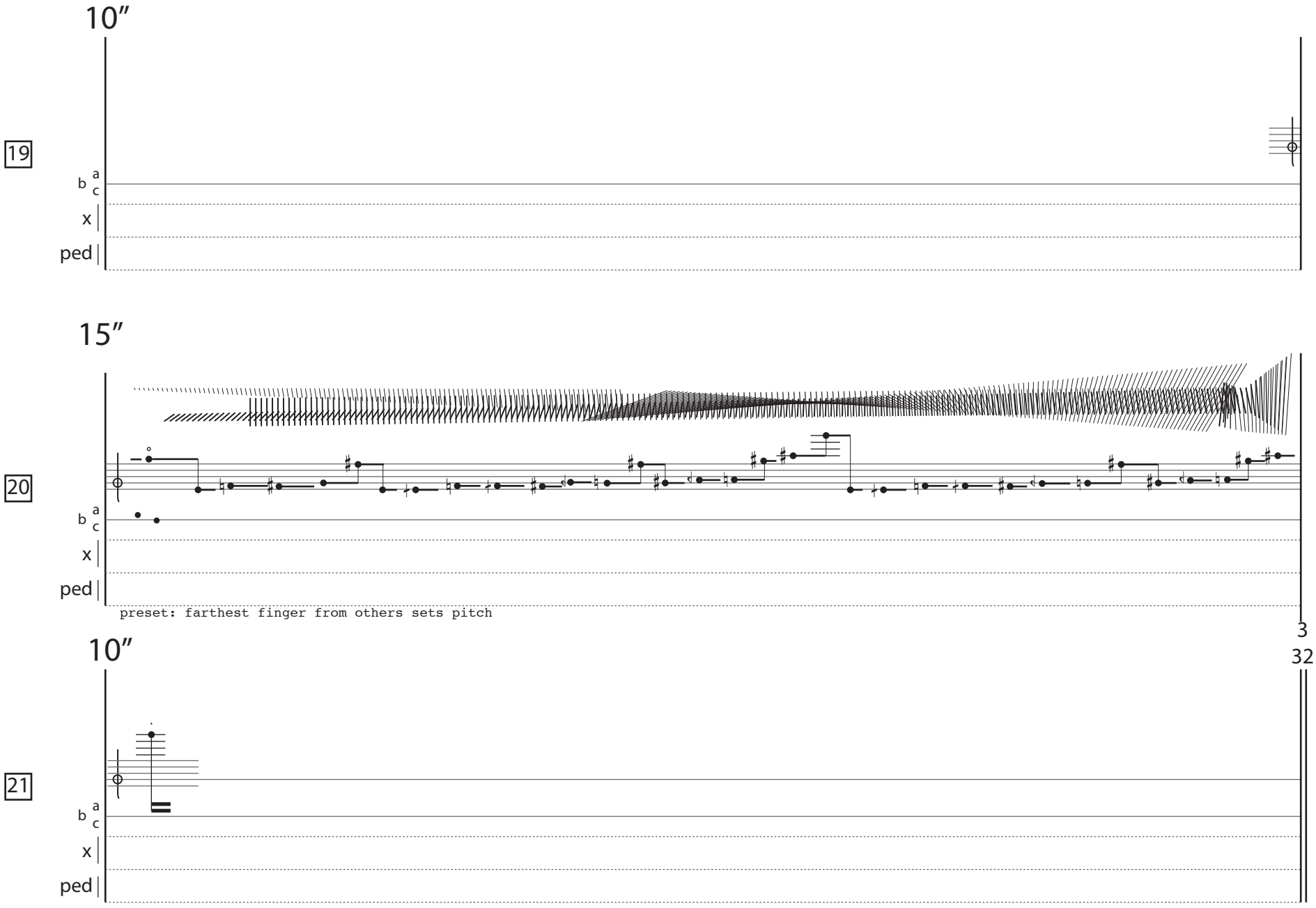
piano: 3

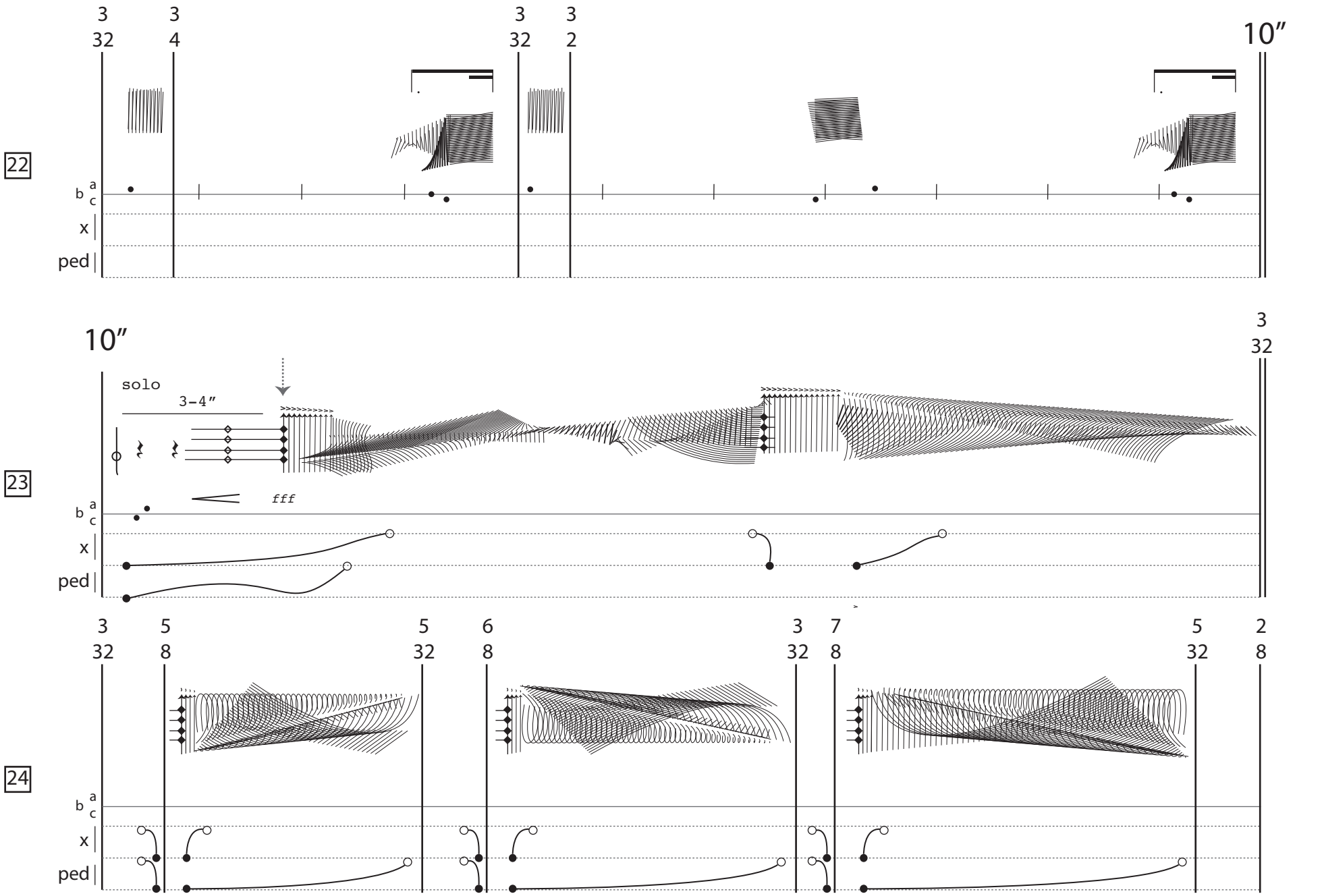

3
32
5
8
5
32
6
8
3
32
7
8
5
32
10″
10
b a
c
x
ped
10″
11
b a
c
x
ped
3
32
12
fff
b a
c
x
ped

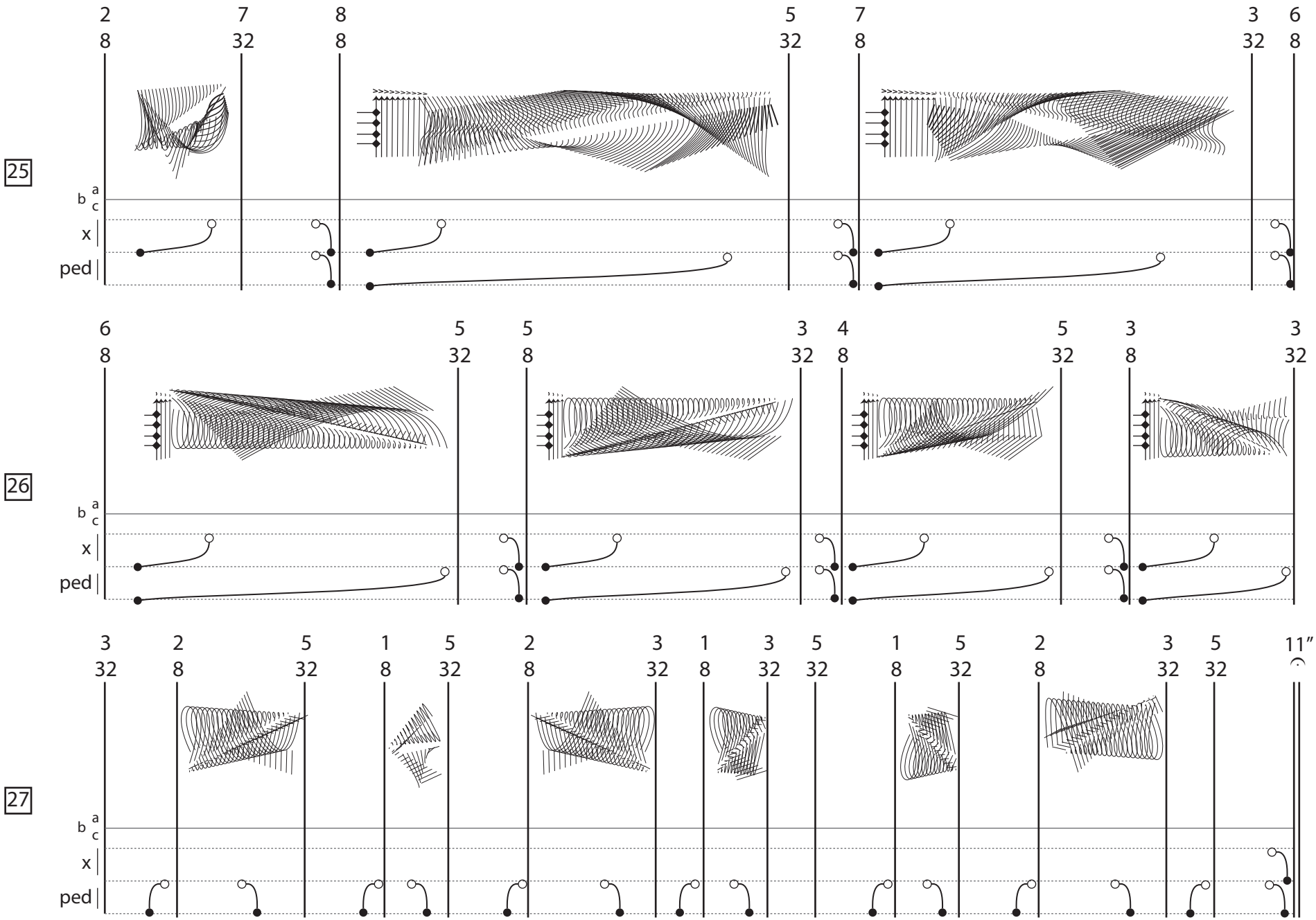
piano: 4

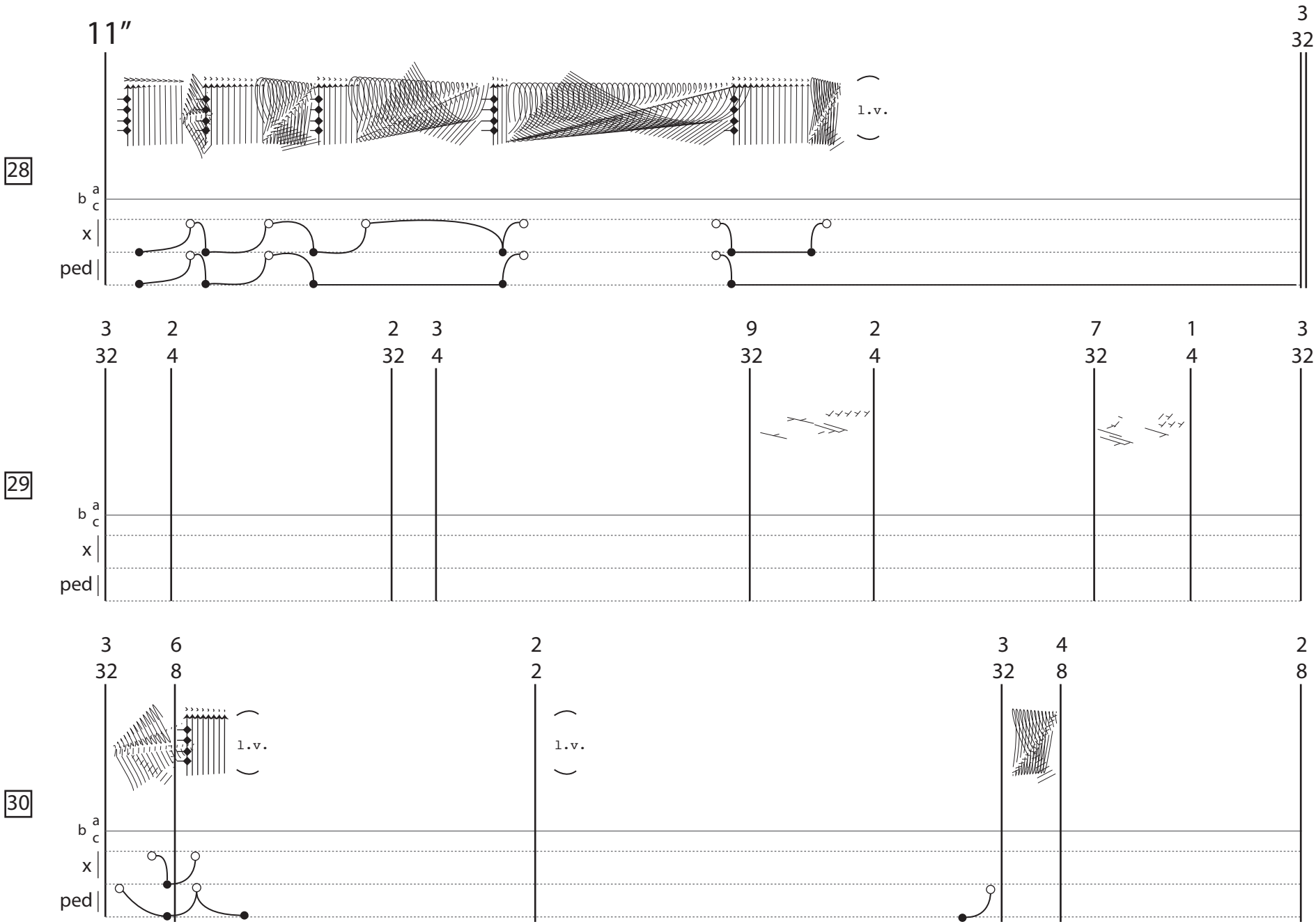

3/32
7/8
5/32
8/8
5/32
2/8
7/32
10″
13
b a c
x
ped
10″
14
b a c
x
ped
10″
1/4
15
pp
mp
.. sim.
b a c
x
ped
... sim.

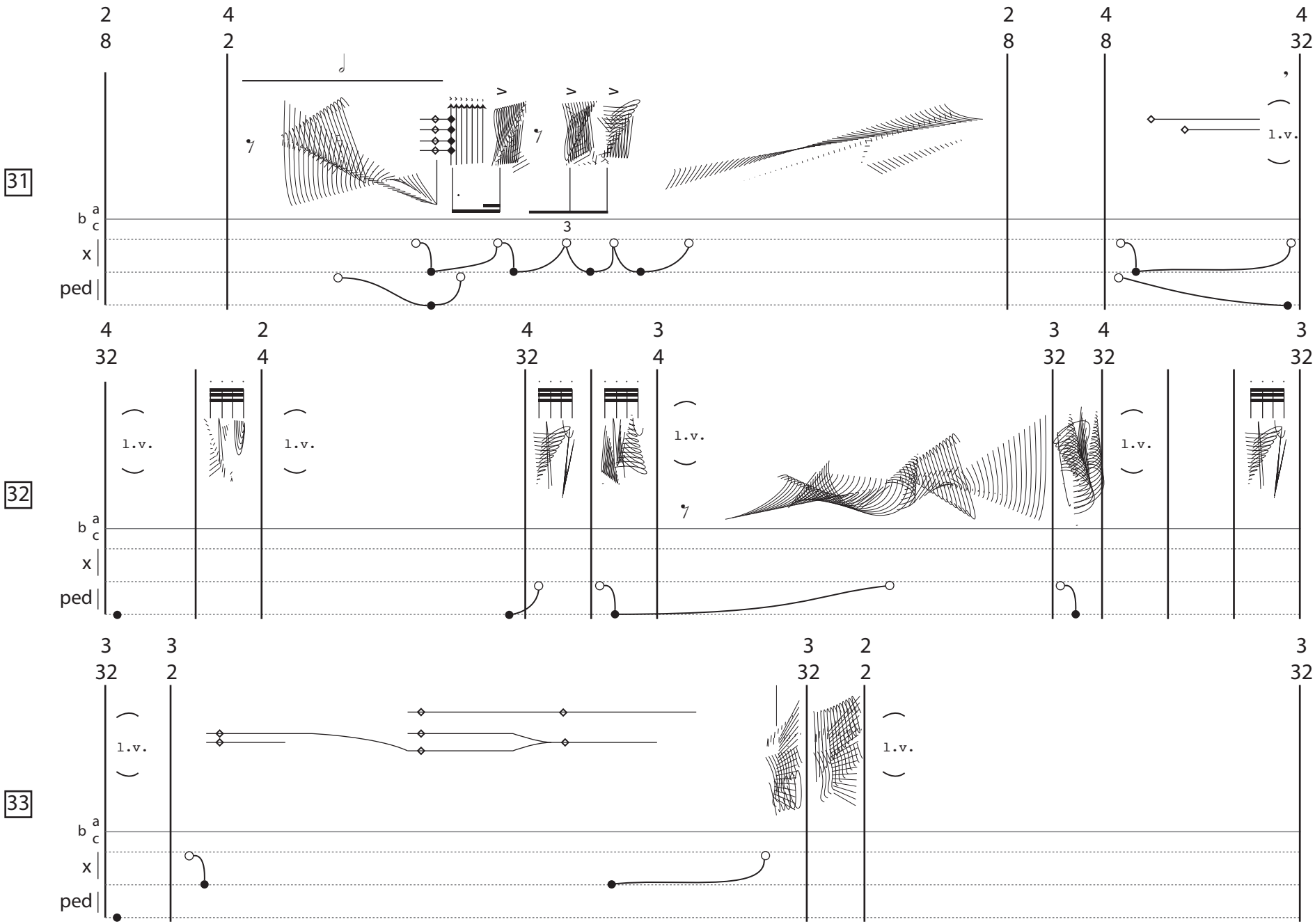

very slow
a tempo
1 4 4 4 3 4 2 4 1 4 3 32
16
b a c
x
ped
3 32 3 2 3 32 3 4
10″
17
b a c
x
ped
10″
18
b a c
x
ped

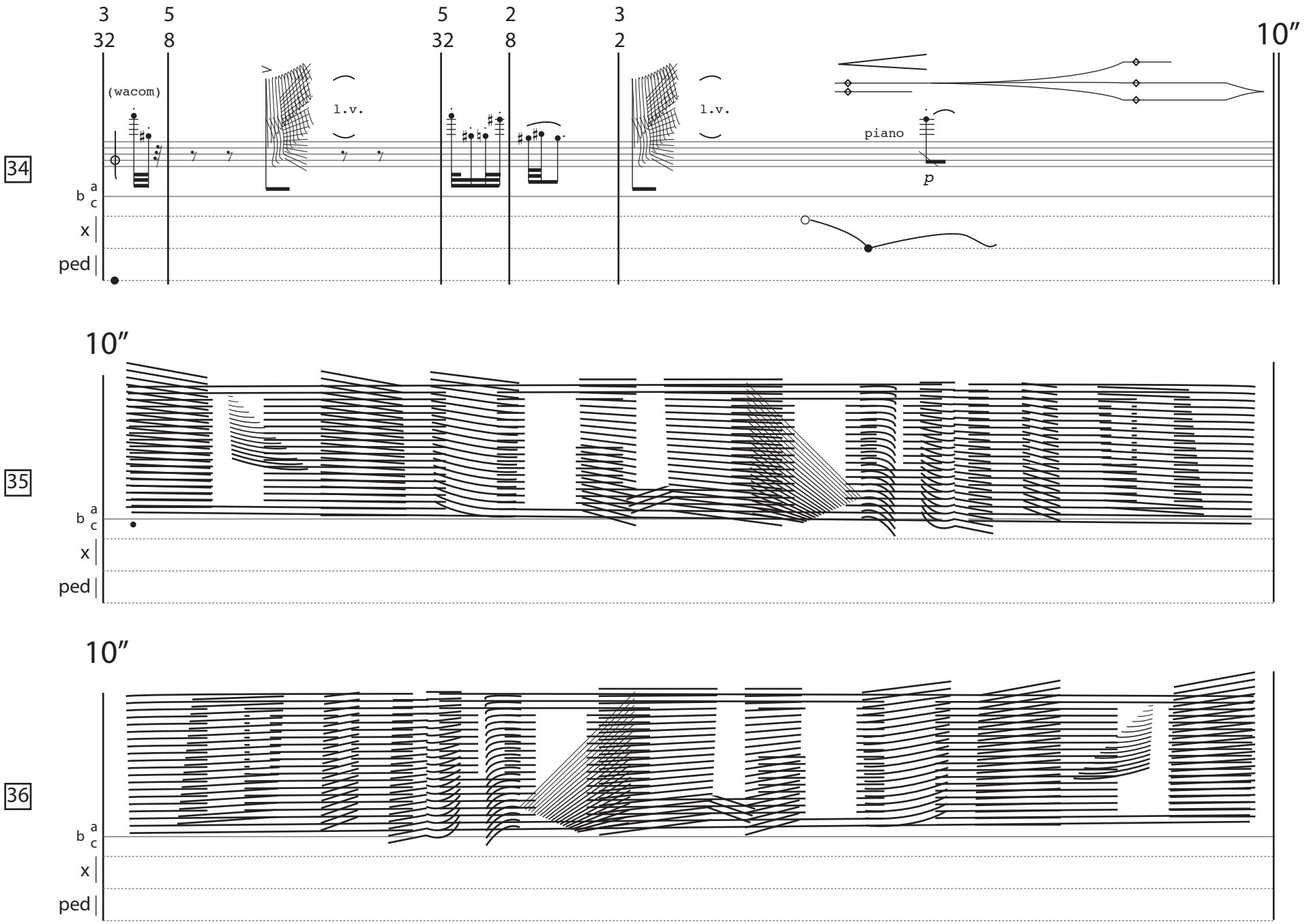

10″
19
b a c
x
ped
15″
20
b a c
x
ped
preset: farthest finger from others sets pitch
3
32
10″
21
b a c
x
ped

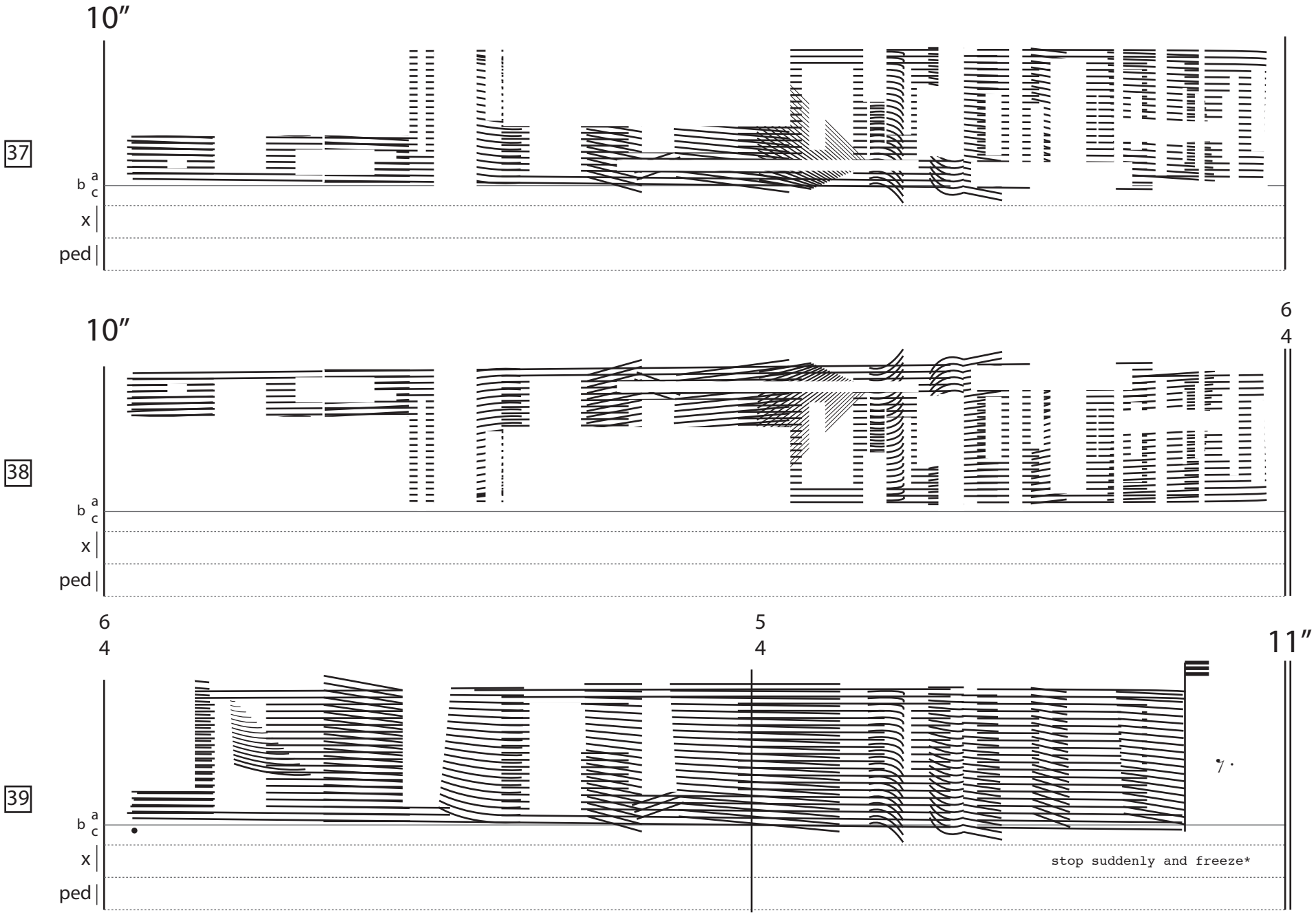

22
3 3 3 3
32 4 32 2
10″
b a
c
x
ped
23
10″
3
32
solo
3–4″
fff
b a
c
x
ped
24
3 5 5 6 3 7 5 2
32 8 32 8 32 8 32 8
b a
c
x
ped


25
2 8
7 32
8 8
5 32
7 8
3 32
6 8
b a c
x
ped
26
6 8
5 32
5 8
3 32
4 8
5 32
3 8
3 32
b a c
x
ped
27
3 32
2 8
5 32
1 8
5 32
2 8
3 32
1 8
3 32
5 32
1 8
5 32
2 8
3 32
5 32
11″
b a c
x
ped


11″
3
32
l.v.
28
b a
c
x
ped
3
32
2
4
2
32
3
4
9
32
2
4
7
32
1
4
3
32
29
b a
c
x
ped
3
32
6
8
l.v.
2
2
l.v.
3
32
4
8
2
8
30
b a
c
x
ped


31
32
33
b a
c
x
ped
l.v.
3


3
32
5
8
5
32
2
8
3
2
10″
(wacom)
l.v.
l.v.
piano
p
34
b a
c
x
ped
10″
35
b a
c
x
ped
10″
36
b a
c
x
ped



*possibly wacom will control the white noise in the speakers... to be determined

11″

40

(possibly the wacom instrument will control the white noise, still to be determined)

b a c

x

ped

41

b a c

x

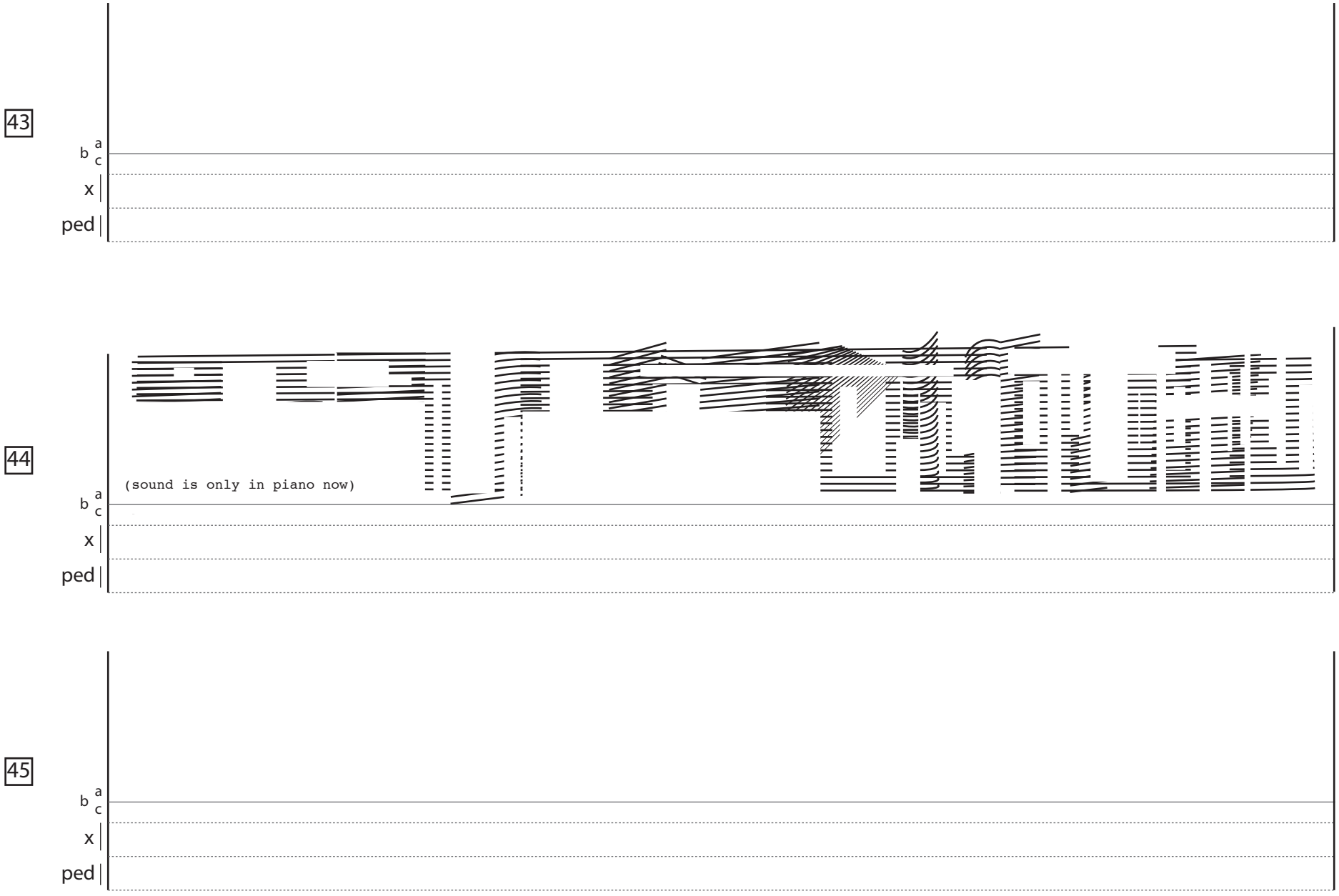
ped

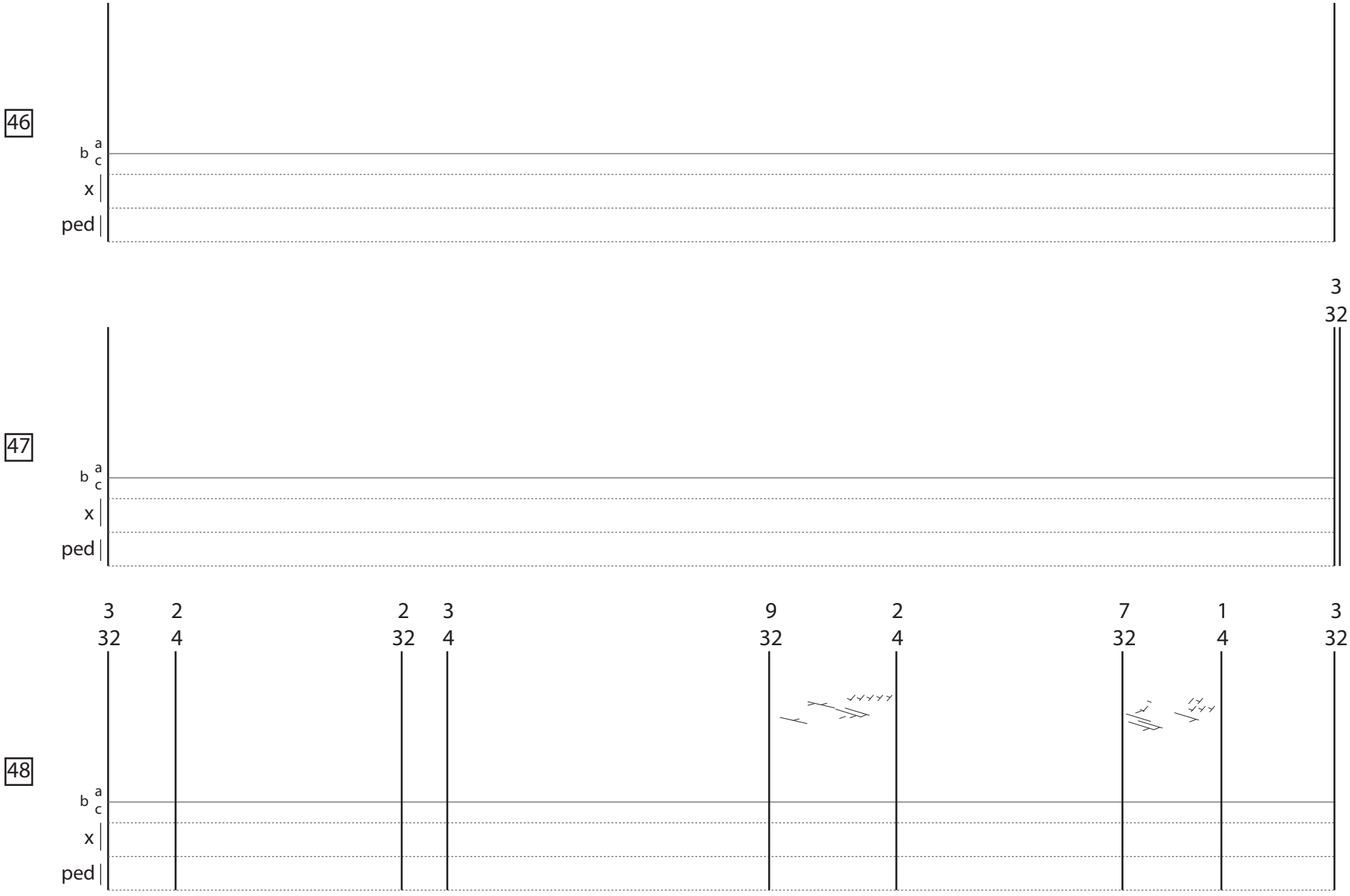
42

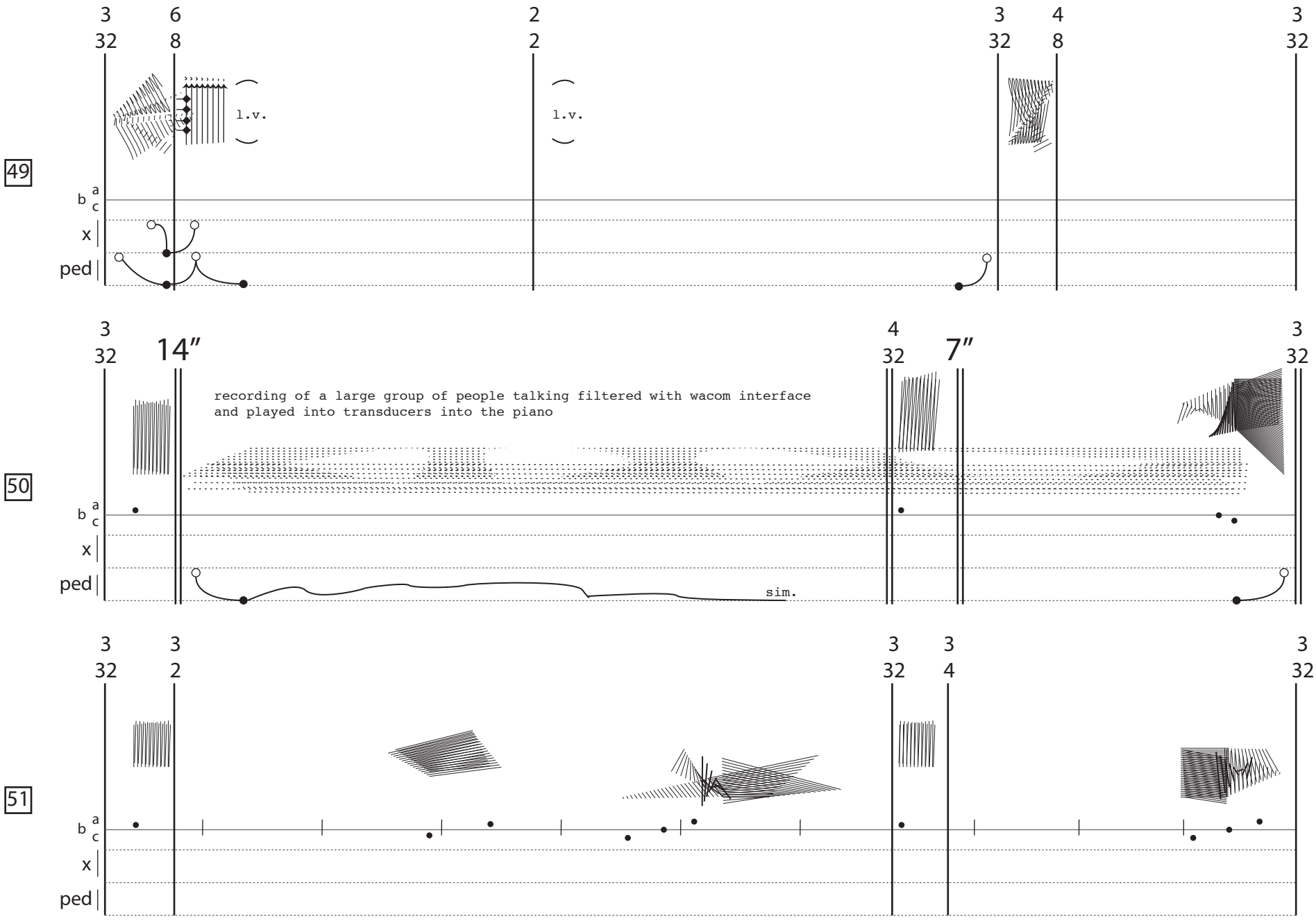
b a c

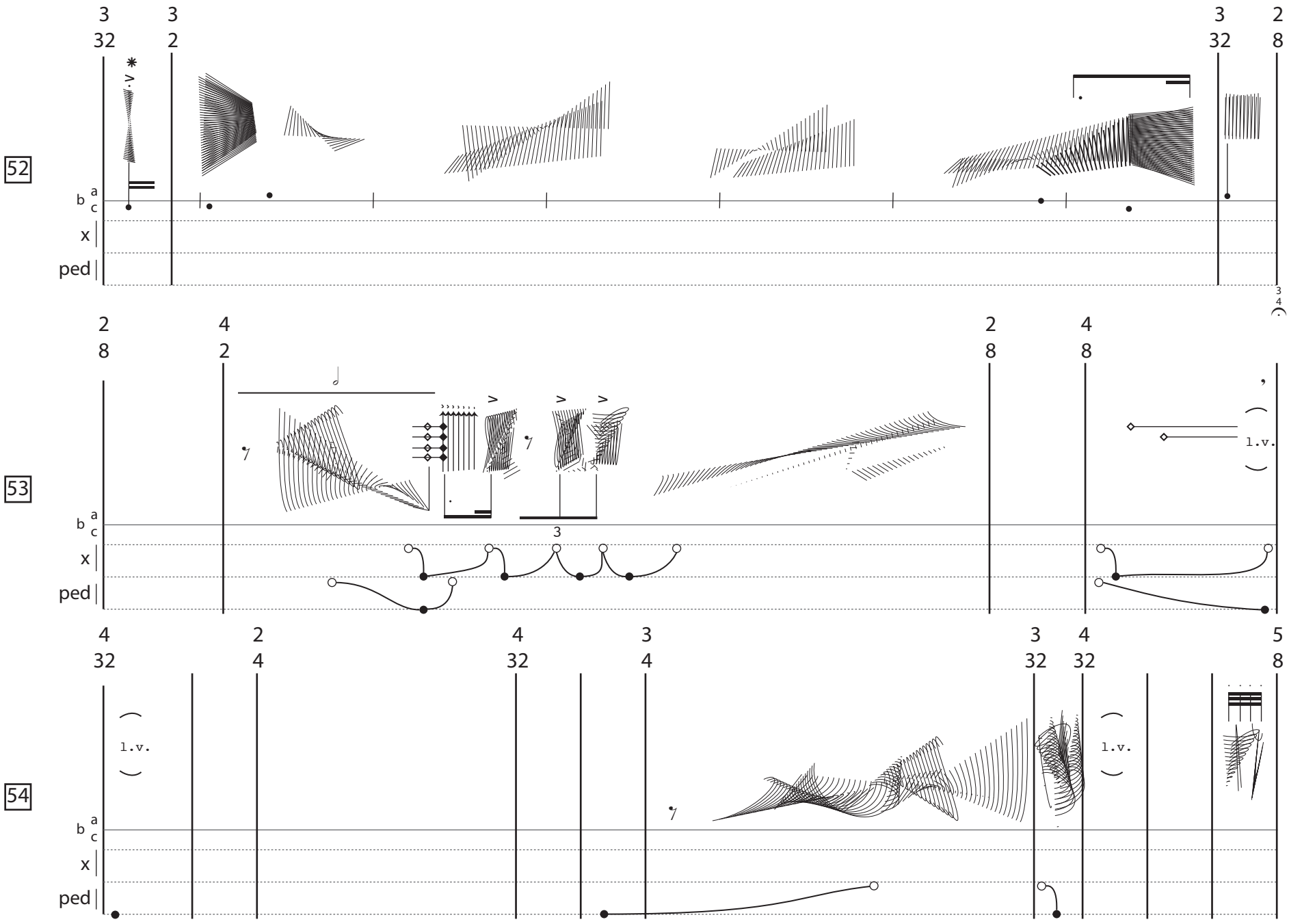
x

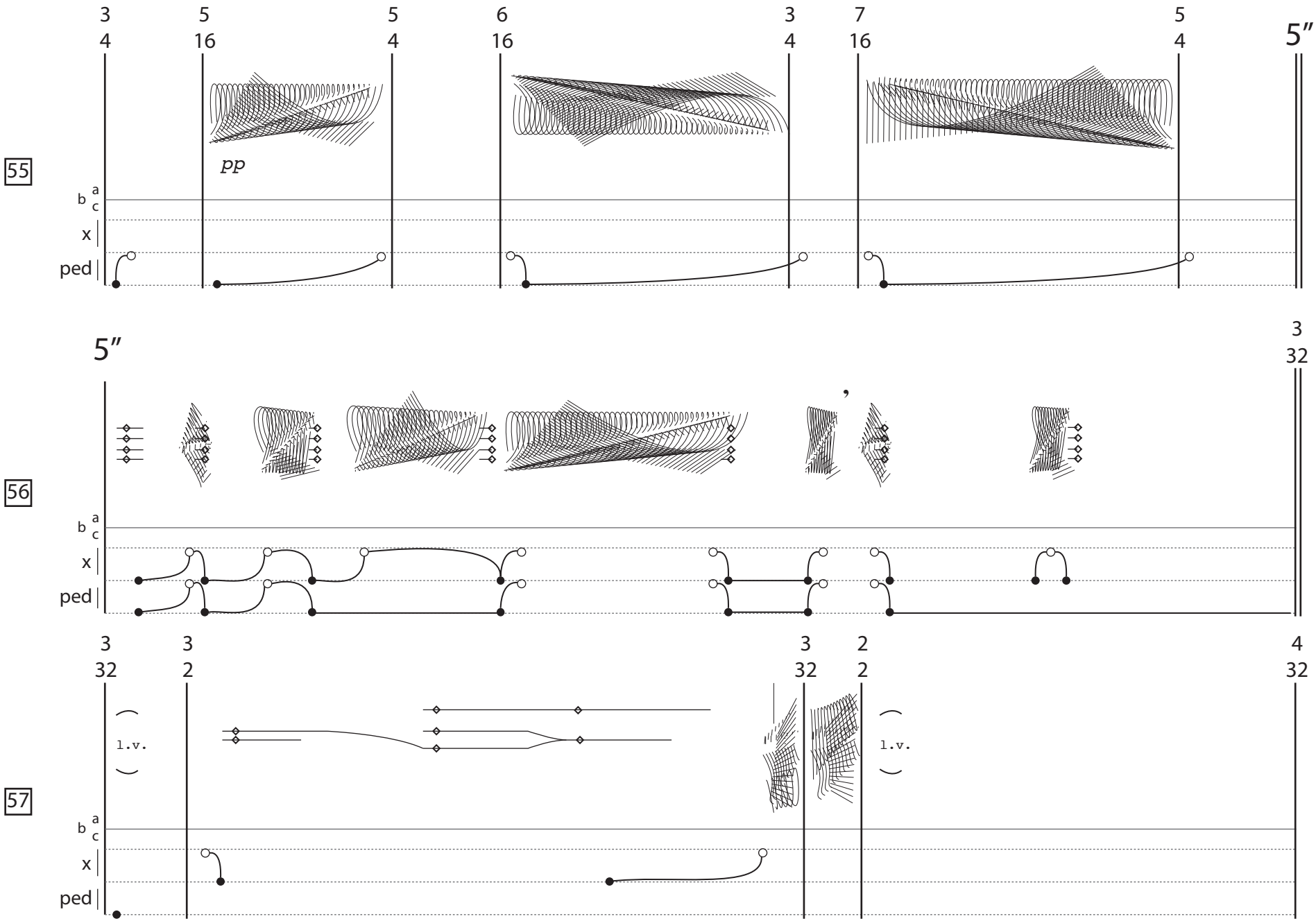
ped

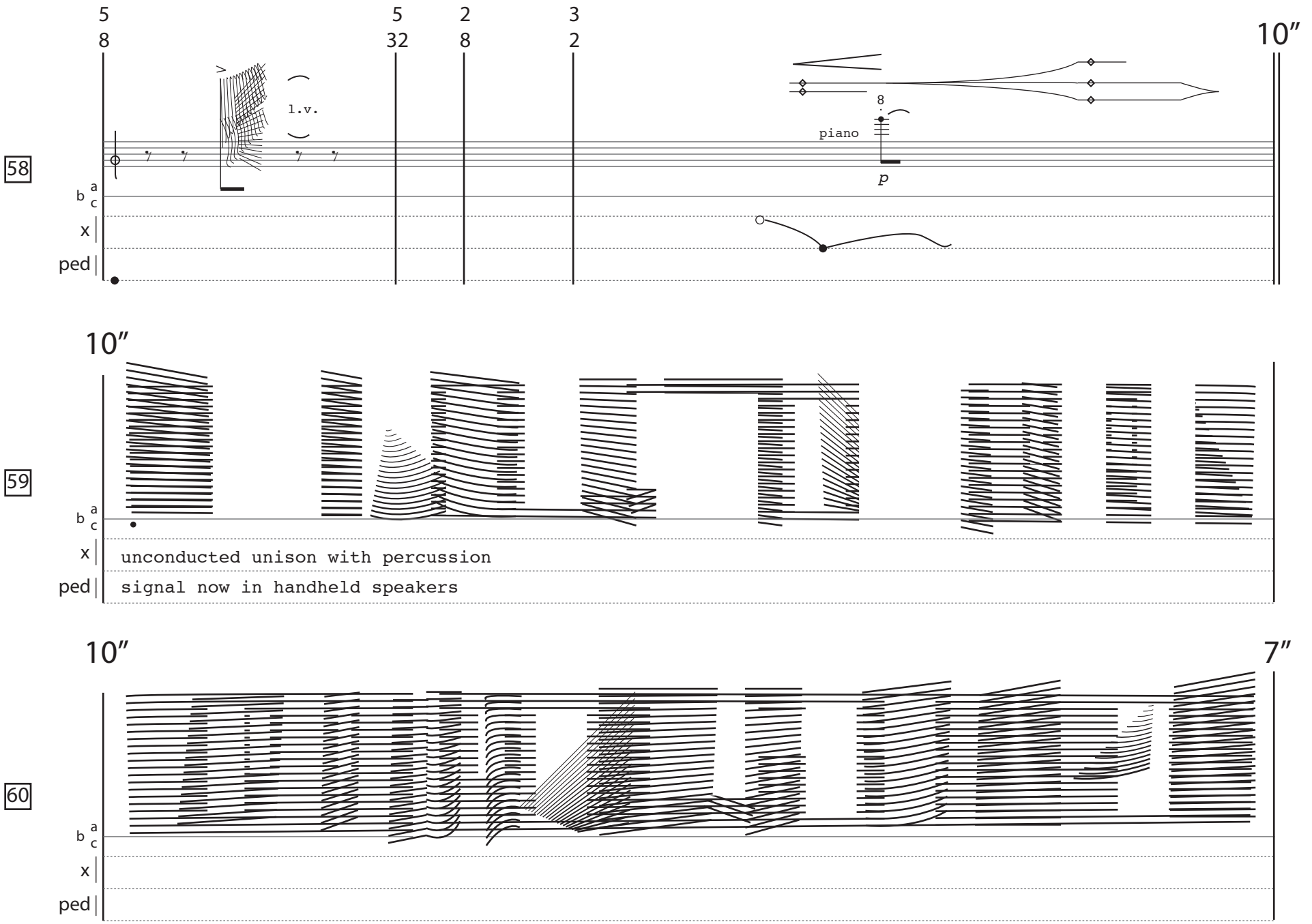

43
b a
c
x
ped
44
(sound is only in piano now)
b a
c
x
ped
45
b a
c
x
ped

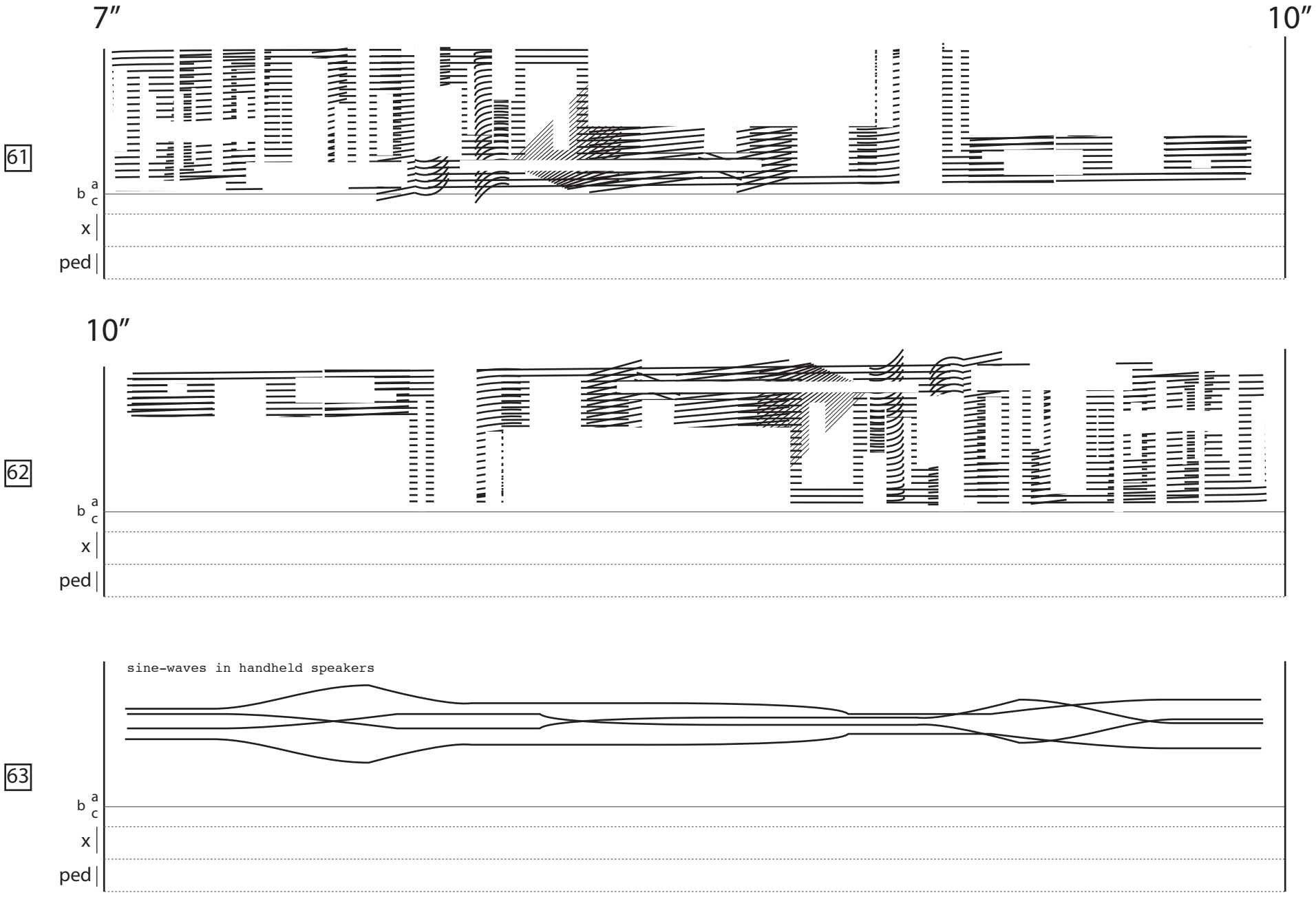

46
b a c
x
ped
47
3 32
b a c
x
ped
48
3 32
2 4
2 32
3 4
9 32
2 4
7 32
1 4
3 32
b a c
x
ped

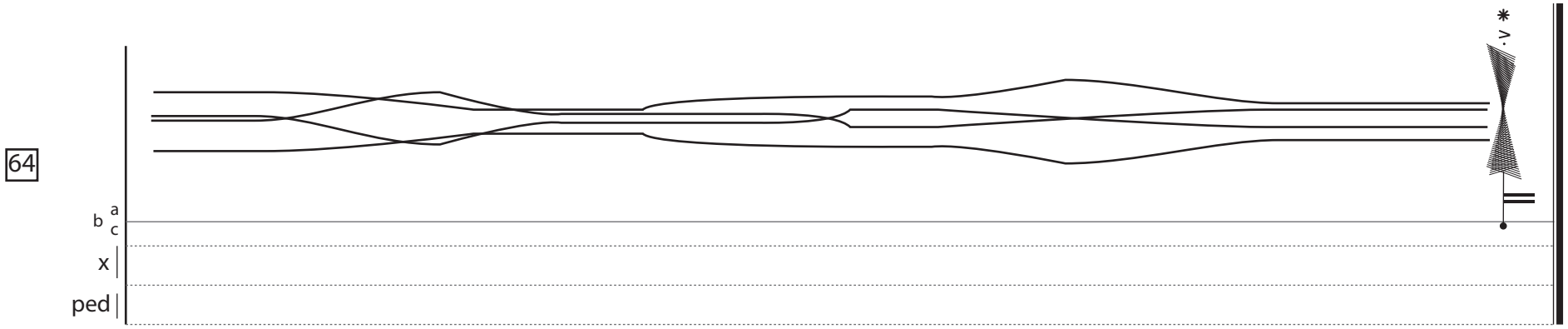

49
3 32
6 8
2 2
3 32
4 8
3 32
l.v.
l.v.
b a c
x
ped
50
3 32
14″
4 32
7″
3 32
recording of a large group of people talking filtered with wacom interface
and played into transducers into the piano
sim.
51
3 32
3 2
3 32
3 4
3 32


52
53
54
b a
c
x
ped
l.v.


55
3 4
5 16
5 4
6 16
3 4
7 16
5 4
5″
pp
b a c
x
ped
56
5″
3 32
,
b a c
x
ped
57
3 32
3 2
3 32
2 2
4 32
l.v.
l.v.
b a c
x
ped


5/8
5/32
2/8
3/2
10″
l.v.
piano
p
58
b a c
x
ped
10″
59
unconducted unison with percussion
signal now in handheld speakers
10″
7″
60


7″
10″
61
b a
c
x
ped
10″
62
b a
c
x
ped
sine-waves in handheld speakers
63
b a
c
x
ped


64
b a
c
x
ped