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Aiael's Gold

for tenor saxophone and electronics

"Delight in Tetragrammaton, and He shall give the desire of thy heart."
(PSALM 37:4)

Aiael's Gold is dedicated to Michael Straus.

Short Notes:

John Cage, the father of American music avant-garde gave the world a series of preposterous ideas. In his infamous 1952 composition 4'33", the pianist sits at the piano turning blank pages of paper, while the audience listens to the accidental noises produced in the hall. *Aiael's Gold* expands this concept by inviting sounds from the outside environment to enter the concert space; two microphones, positioned outside the concert space, transfer the surrounding sounds to the computer. The sonorities are then processed in real time and recorded. The complete recording of unprocessed sounds from the exterior X is used in the following performance, transporting the sonic memories of outer spaces to new locations.

In Cagean sense, form is a series of empty pockets to be filled with sonic vibrations. *Aiael's Gold* takes three notorious compositions from the Western common practice literature and fills their rhythmic pockets with the sounds of the present and past exterior environments. The amplitude of the past exterior recording controls the presence and absence of these rhythms in the performance. Real-time processed saxophone sonorities complete the dense character of the piece.

Long Notes:

Aiael is known as an ancient archangel assisting in development of consciousness through silence and meditation. *Aiael's Gold* investigates silence and sonorities positioned on the border of hearing in the framework of an electroacoustic composition.

The piece begins in silence and with the saxophone player listening to the resonances of the performance space. Then, the performer produces tones of diverse quality such as air thrusts, air tones, ghost tones and squeaks, always avoiding the full tones. These intermediate stages of saxophone tone production become the composition's core timbral vocabulary. To highlight the quiet sonorities and transitiveness of tone production, the pitch manifests as a residue of noise throughout. Although *Aiael's Gold* is formally "wrapped" in three pieces composed by C. Gounod and J.S. Bach, the timbres conceal recognition of the original sources and showcase the unique power of color in music.

Additionally, the performer uses a piece of cellophane and the paper score of the piece as an instrument. Actions such as polishing the saxophone with paper, placing the cellophane in the horn of the instrument to filter its sonorities and tearing the paper into pieces in the end expands the notion of concert music. Paper-score artifacts are thus defined not only as vehicles for passive transmission of music information but also as active sound-making agents.

The computer serves as a memory bank. A stereo microphone is placed outside the concert space to record environmental sounds happening during the performance and also to be processed in real time during the performance. The complete recording of the exterior space is used in the following performance in a form of memory bits, pockets, fragments, blocks and also in its totality. Its amplitude is used to control the accompaniment portions of the electronics. *Aiael's Gold* is, thus a piece that continuously evolves with each performance. It presents a kaleidoscope of sonic memories from the exteriors of last and current performance spaces. Interaction between the live player and memory-based sonic material is at core of the composition.

Tech requirements:
1 air mike such as AMT LS Microphone for saxophone amplification and processing
1 stereo mike or stereo pair for recording sounds from the environment outside the concert space
1 three-IN and two-OUT digital audio interface
1 computer running MAX5
1 two-channel audio set up

1 piece of flexible cellophane
1 score to be performed with, crumbled and torn at the end of the piece

Important Notes:
1. A stereo mike is placed outside the concert hall, **preferably outside on the street** where it records the environmental sounds directly to the computer. Be sure to save two mono files of the recorded performance in the patch folder and name them L.wav and R.wav prompted at the end of the performance.
4. Timing: absolute time at the end of the each line suggests when the last event should be performed.

About Electronics:
1. All MAX/MSP patches and files should be stored in the same folder.
2. Open patch AG. Microphones (adc~1 2 3) should be mapped as following: outside mikes (adc~ 1 2) and saxophone mike (adc~3)
3. Subpatchers and their functions:
    a. buffers: looping the recording of the previous exterior space; to be stored
    b. RT-buffers: looping and processing the saxophone sound in real time
    c. controlLayer: various timing algorithms to control buffers
    d. stopwatch: does what it says
    e. effects: pitch bending of the real-time saxophone input
    f. filters: running the segments of previous exterior recording through resonant filters
    g. Ave: MIDI data from the accompaniment of Gounod's Ave Maria running through resonant filters; presence controlled by the amplitude of the previous exterior recording

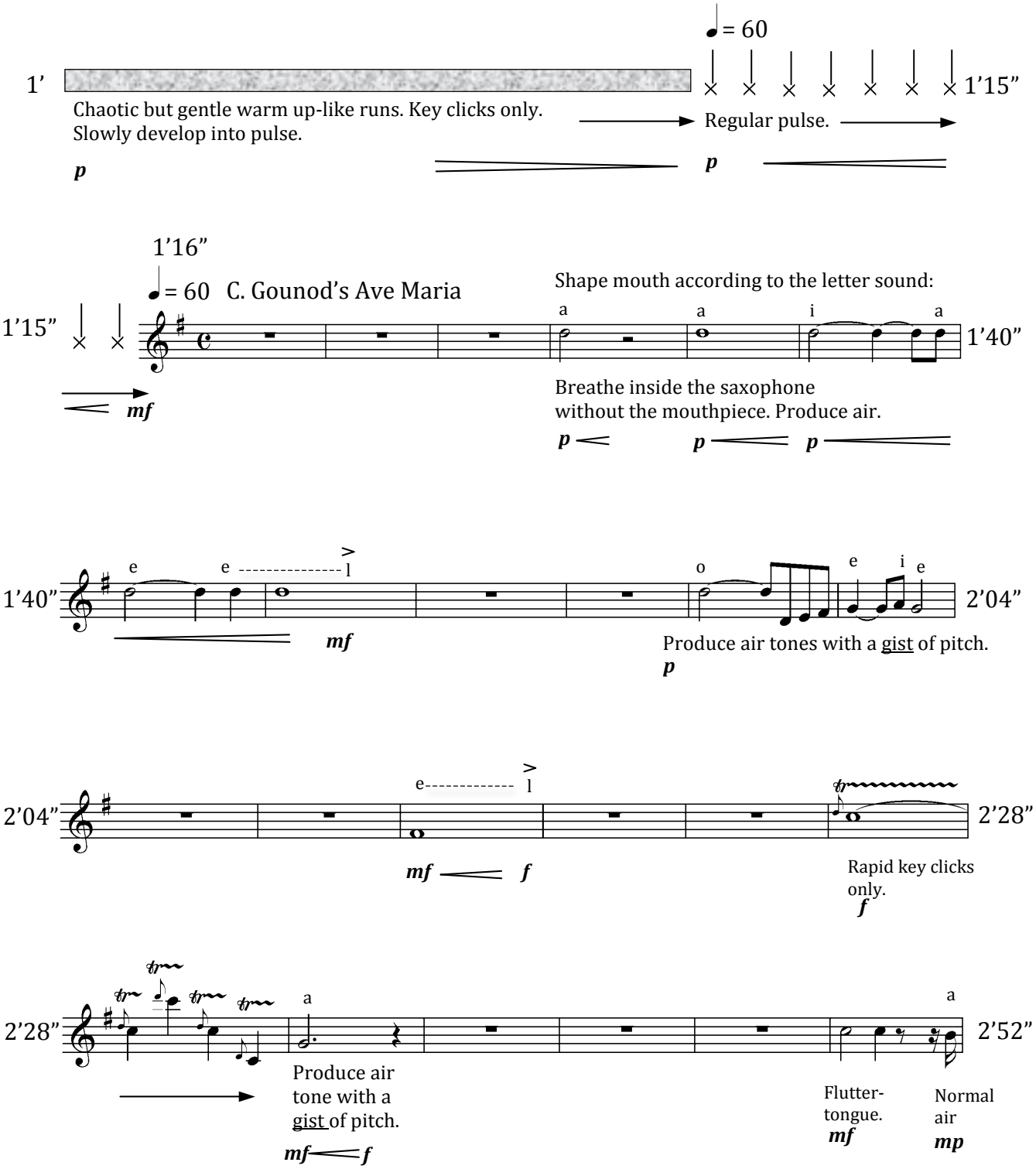
h. Ave1: MIDI data from the accompaniment of Gounod's Ave Maria running through physical models of diverse shakers; presence controlled by saxophone amplitude
i. FugueSop, FugueAlt and FugueBari: MIDI data from individual voices of J.S.Bach's three-part fugue in f minor, WTK II Maria running through resonant filters; presence controlled by the amplitude of the previous exterior recording
j. Brandenburg, Brandenburg2: MIDI data from J.S.Bach's Brandenburg Concerto #3, Movement 3 running though resonant filters; presence controlled by the amplitude of the previous exterior recording

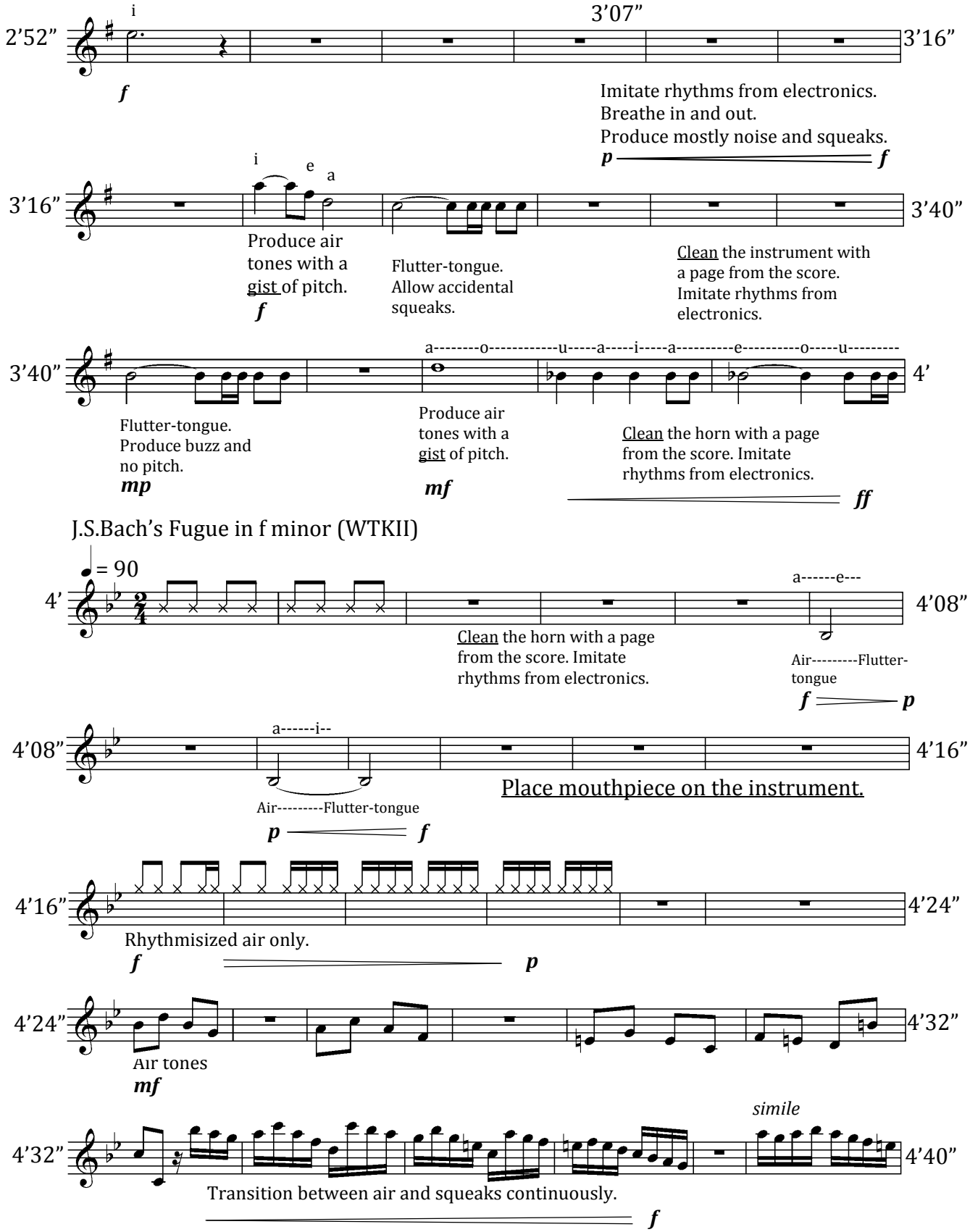
Tone quality descriptions ordered from soft to loud (to be performed with or without the mouthpiece):
Air: air only, no pitch
Air tone: air with a gist of pitch
Air squeak: air with the gist of overblown partials
Squeak: overblown partial
Ghost tone: air squeak with the gist of written pitch
Half tone: half air and half tone

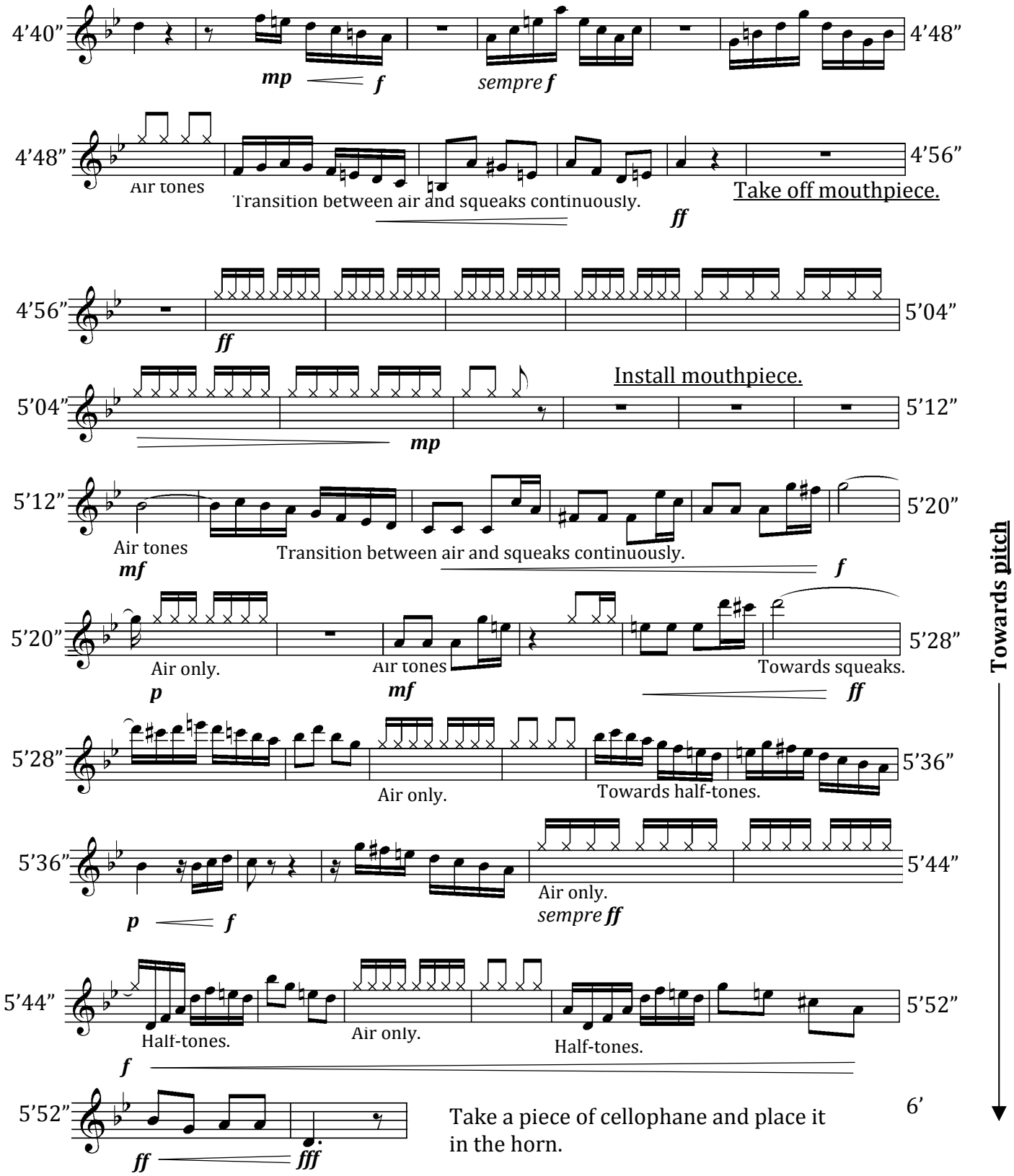
Vowel pronunciation:
a as in L<u>o</u>ve
e as in L<u>e</u>t
o as in G<u>o</u>ld
i as in L<u>i</u>ght
u as in L<u>oo</u>p

0—1’

The patch should begin as soon as the performer appears on the stage.
Performer: bring the music and position it on the stand. Remove the mouthpiece and set yourself up for the performance. Unintentional noises are welcome. Listen to the environment.



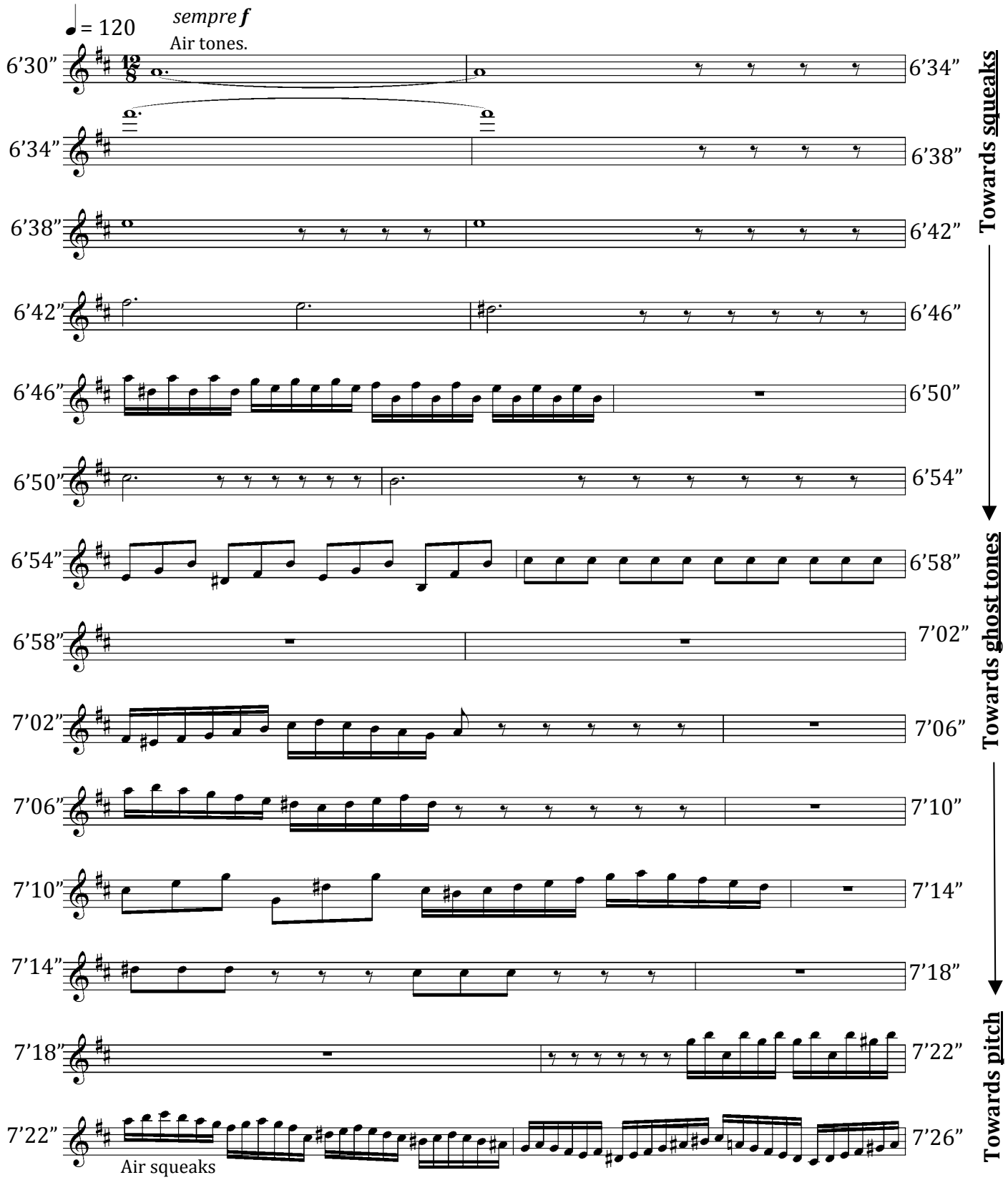

2’52”
3’07”
3’16”
i
f
Imitate rhythms from electronics.
Breathe in and out.
Produce mostly noise and squeaks.
p
f
3’16”
i e a
3’40”
Produce air tones with a gist of pitch.
f
Flutter-tongue. Allow accidental squeaks.
Clean the instrument with a page from the score. Imitate rhythms from electronics.
3’40”
a--------o-----------u-----a-----i-----a----------e----------o-----u---------
4’
Flutter-tongue. Produce buzz and no pitch.
mp
Produce air tones with a gist of pitch.
mf
Clean the horn with a page from the score. Imitate rhythms from electronics.
ff
J.S.Bach’s Fugue in f minor (WTKII)
= 90
4’
a------e---
4’08”
Clean the horn with a page from the score. Imitate rhythms from electronics.
Air---------Flutter-tongue
f
p
4’08”
a------i--
4’16”
Air---------Flutter-tongue
p
f
Place mouthpiece on the instrument.
4’16”
4’24”
Rhythmisized air only.
f
p
4’24”
4’32”
Air tones
mf
4’32”
simile
4’40”
Transition between air and squeaks continuously.
f

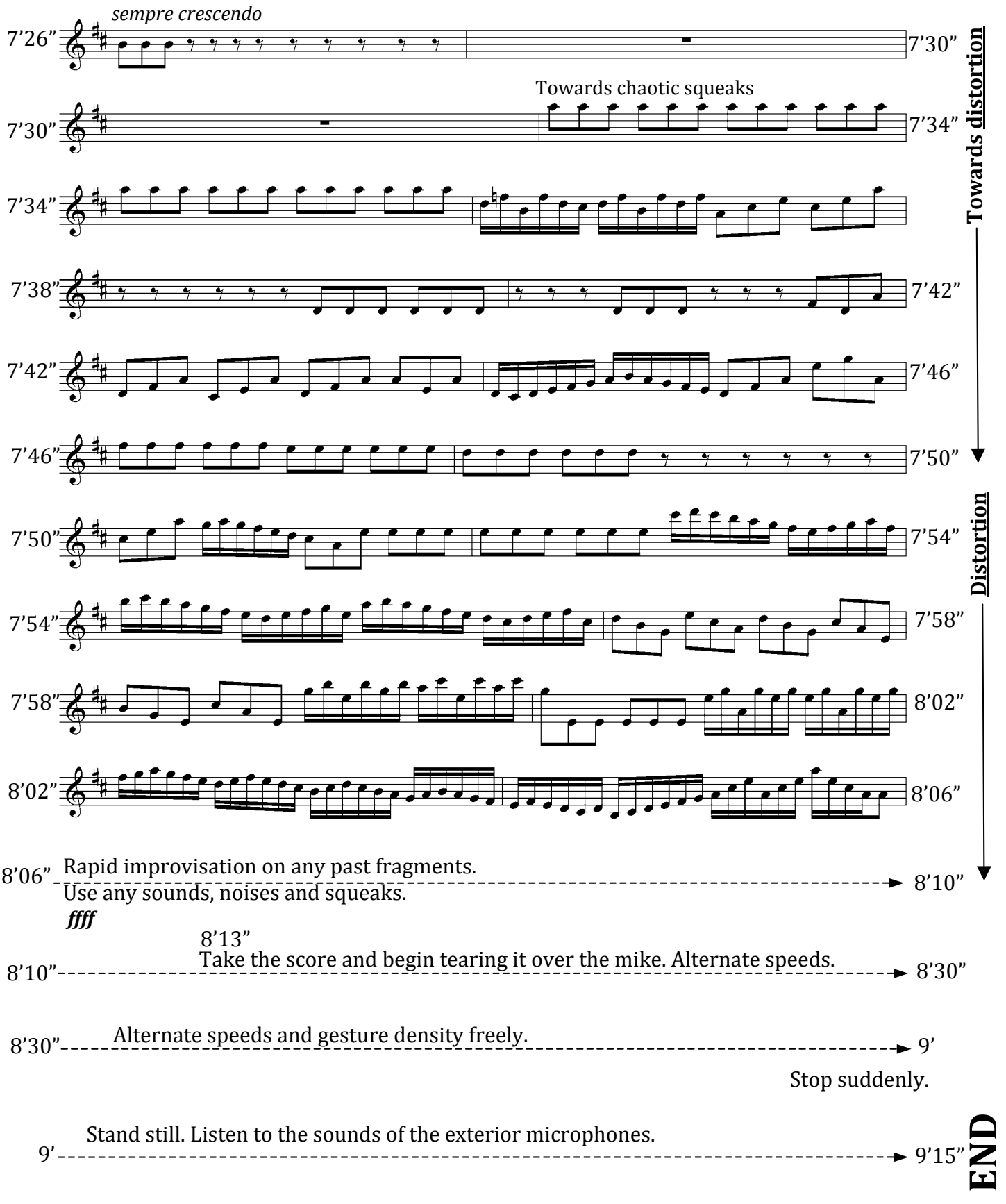


6' Test blow any pitch. The filtered rattle should result. Repeat. Leave the cellophane in the horn until the air pushes it out. 6'30"

6'30"—8'06". Tone quality: transition smoothly from air to air tones to air squeaks and ghost tones. Ghost tones consist of upper overblown partials and gist of notated tones. Allow distortion to develop.
sempre crescendo al ffff

J. S. Bach: Brandenburg Concerto Nr. 3, Mvt. 3





Save the files when prompted in the folder where the patch is located as
L.wav and R.wav