FULL STOP

for processed Violin, Viola and Euphonium (2020)

Brian Lindgren

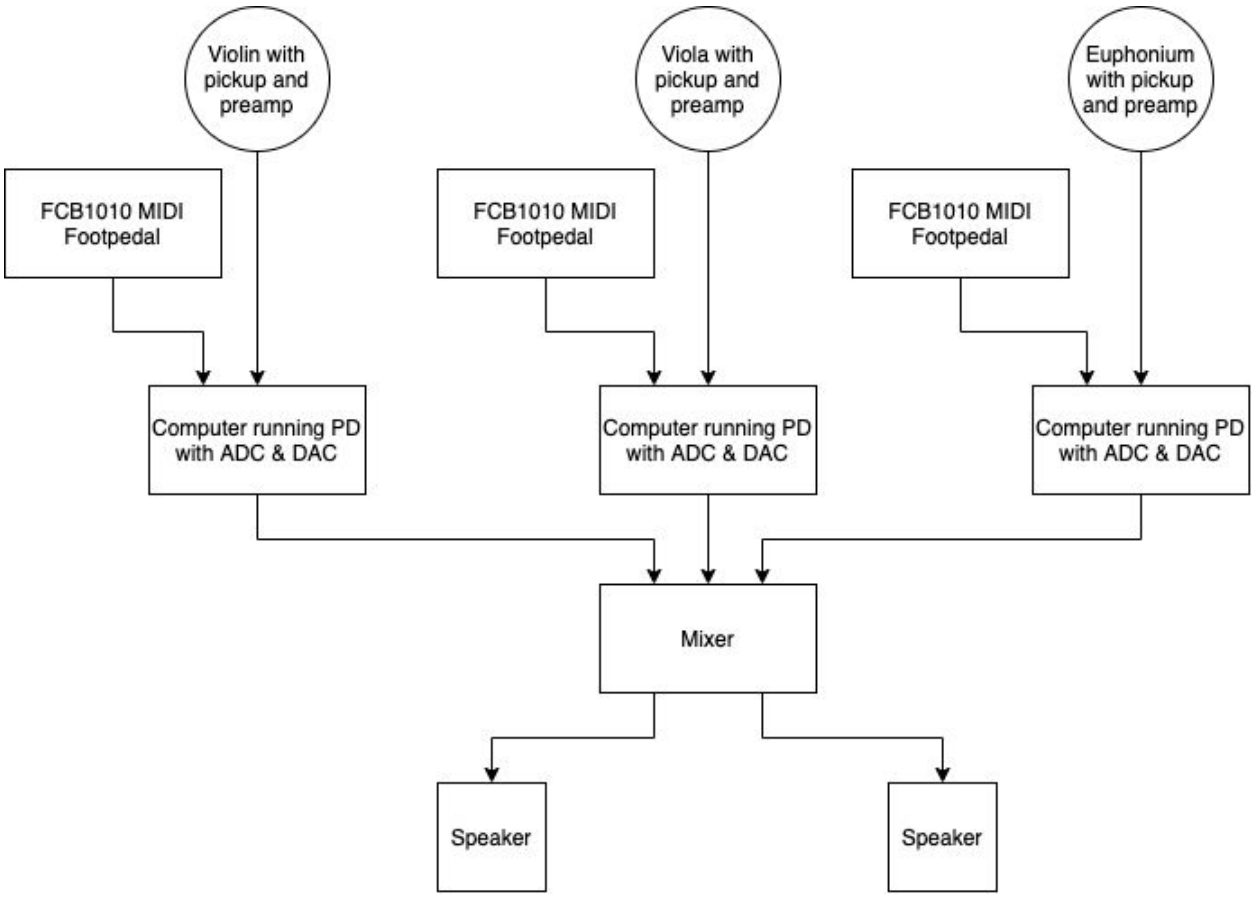
brianlindgren.com

Notes on the Score

TECHNICAL REQUIREMENTS

- Pickups and preamps for each instrument
- Three computers each running Pure Data with an ADC and DAC
- Three Behringer FCB1010 MIDI foot pedals, one running to each computer
- Stereo speaker setup connected to a mixer with at least three inputs

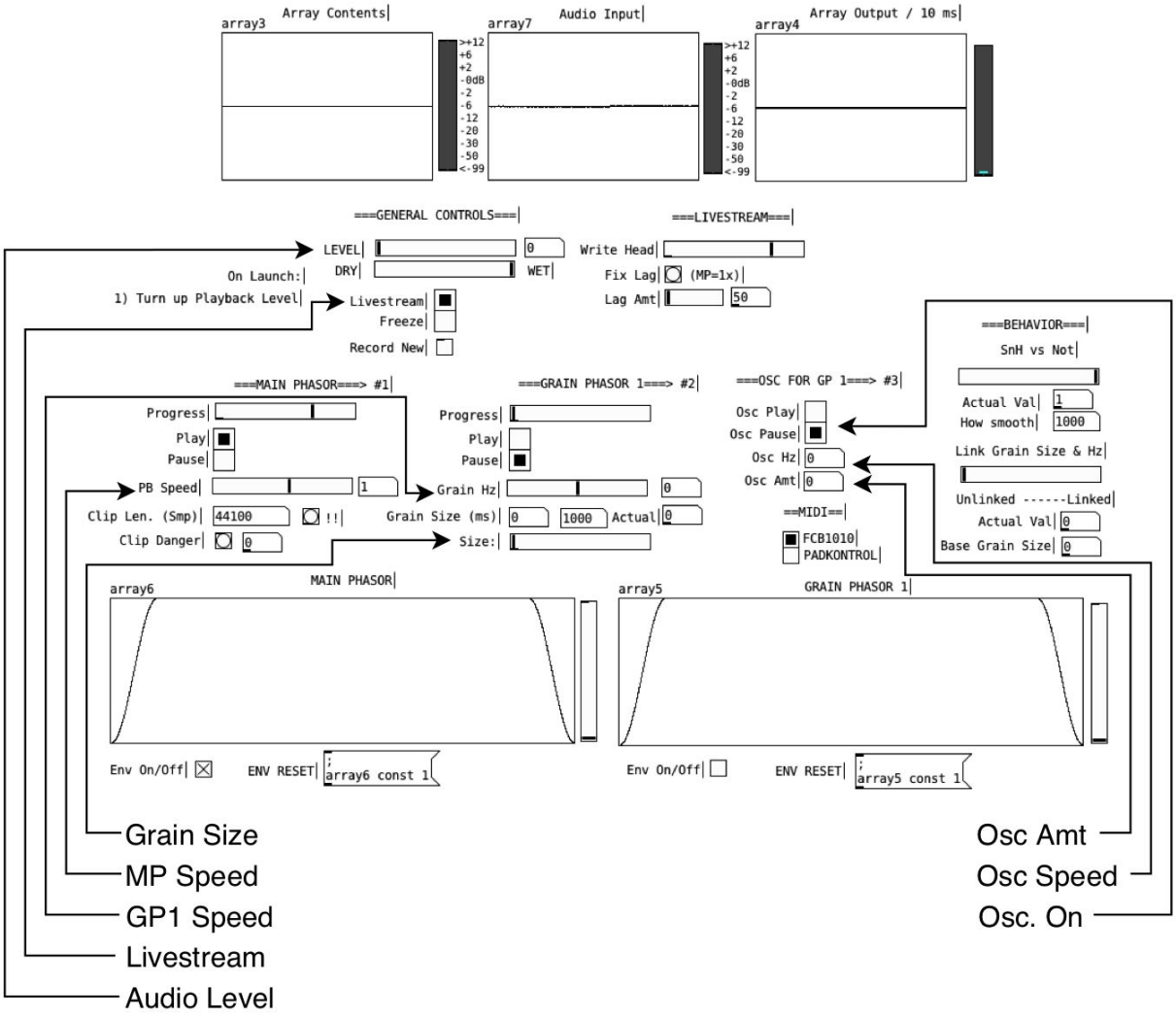
TECHNICAL DIAGRAM



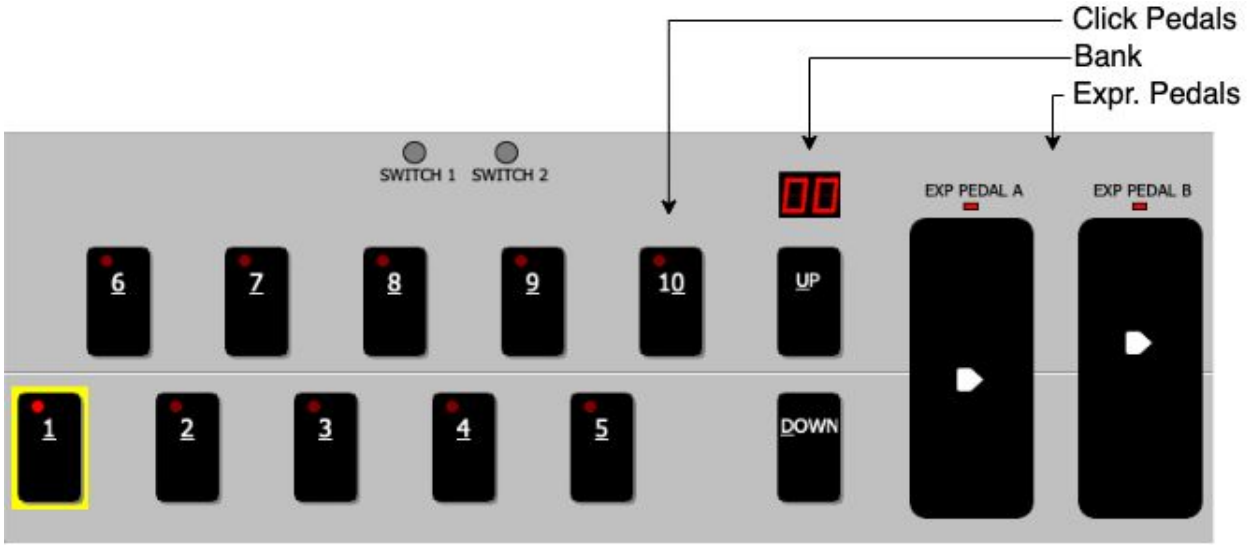
QUICKSTART

- Upload the SYSEX file to the FCB1010 (refer to FCB1010 manual if needed)
- Open “GRAN 28b for FULL STOP.pd” in Pure Data
- Confirm audio and midi routing are setup correctly

PATCH OPERATIONS



FCB1010 OPERATIONS



Bank 0	Bank 1	Bank 2	Bank 3
Dry/Wet: Expr. A Level: Expr. B	MP Play: Click 1 MP Pause: Click 2 MP Sp. Fin.: Expr. A MP Sp. Crs.: Expr. B	GP Play: Click 1 GP Pause: Click 2 Gp Speed.: Expr. A Grain Size: Expr. B	Osc. Play: Click 1 Osc. Pause: Click 2 Osc. Speed.: Expr. A Osc. Amt.: Expr. B

PERFORMANCE SUGGESTIONS

- "Full Stop" is intended to be highly improvisatory in nature. The score is meant to be a leaping off point, a documentation of a specific performance. The performers should feel free to explore the sonic worlds they create through the manipulation of the granular synthesis patch, their own improvisations, and their own communication and creativity together as an ensemble.
- The instruments can be panned in the stereo field so as to correspond with their relative position with each other. For example, if the violin sitting is sitting stage left and the viola is stage right, the panning should match their respective positions on the stage.

ADDITIONAL NOTES

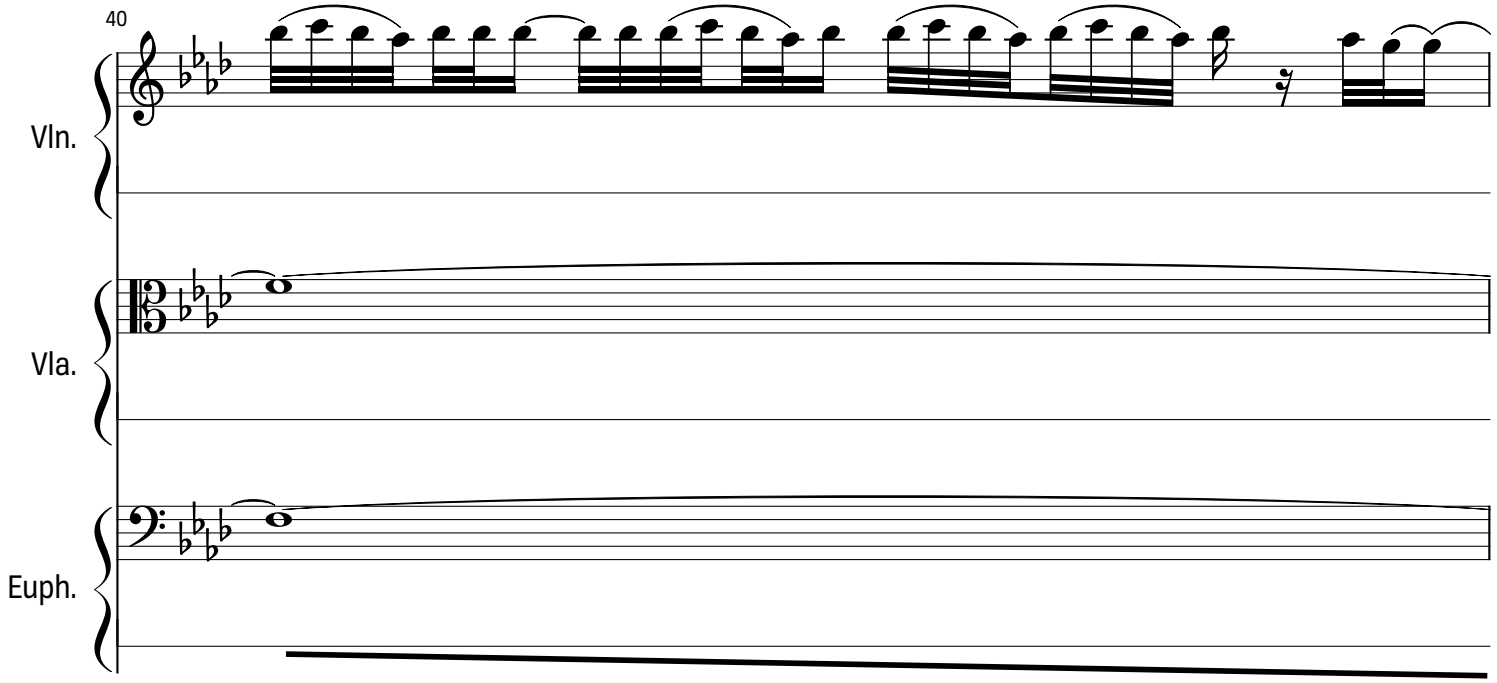
- The patch contains a few settings/behavioral parameters:
    - Livestream / Freeze / Record New:
        - Livestream: continually update the buffer with the input from the ADC
        - Freeze: no longer update the buffer. The material for granular playback is frozen.
        - Record New: record new material into the buffer of an unrestricted length. Check the box to start recording, uncheck to stop.
    - SnH vs Not (Sample and hold or not): this is in regards to the read position of the grain phasor to the main phasor.
        - SnH: the read point of the grain phasor relative to the main phasor is only updated each time the playback of a new grain begins.
        - Not: the read point readpoint is continuously updated as the main phasor's read head moves.
    - Link Grain Size & Hz:
        - Linked: the playback speed and will change as the grain size is adjusted so as to maintain the 'pitch'. Larger grain sizes slow down the playback while smaller grain sizes will speed it up.
        - Unlinked: the playback speed and grain size are independent of each other.
    - Envelopes: these function to prevent clicking sounds as the read heads jump between grains
        - Vertical slider: changes the slope of the envelope fade in / out
        - On/off: self explanatory. A surprising textural difference can be heard when turning the envelopes on and off.
        - Optional: draw your own envelopes!
    - Fix Lag & Amount: The grain read head follows the live input by 50ms. This is to ensure that the read heads do not read 'ahead' of the write head.
        - Lag Amount: this value can be increased up to 950 ms (the buffer size is 1000 ms, so 950 ms is a 'safe' maximum). Increasing the amount creates an interesting delay effect.
        - Fix Lag: as the Main Phasor is started and stopped as well as sped up and down, its location (aka the read head) changes in relation to the write head. Fix Lag will reset its position relative to the write head.

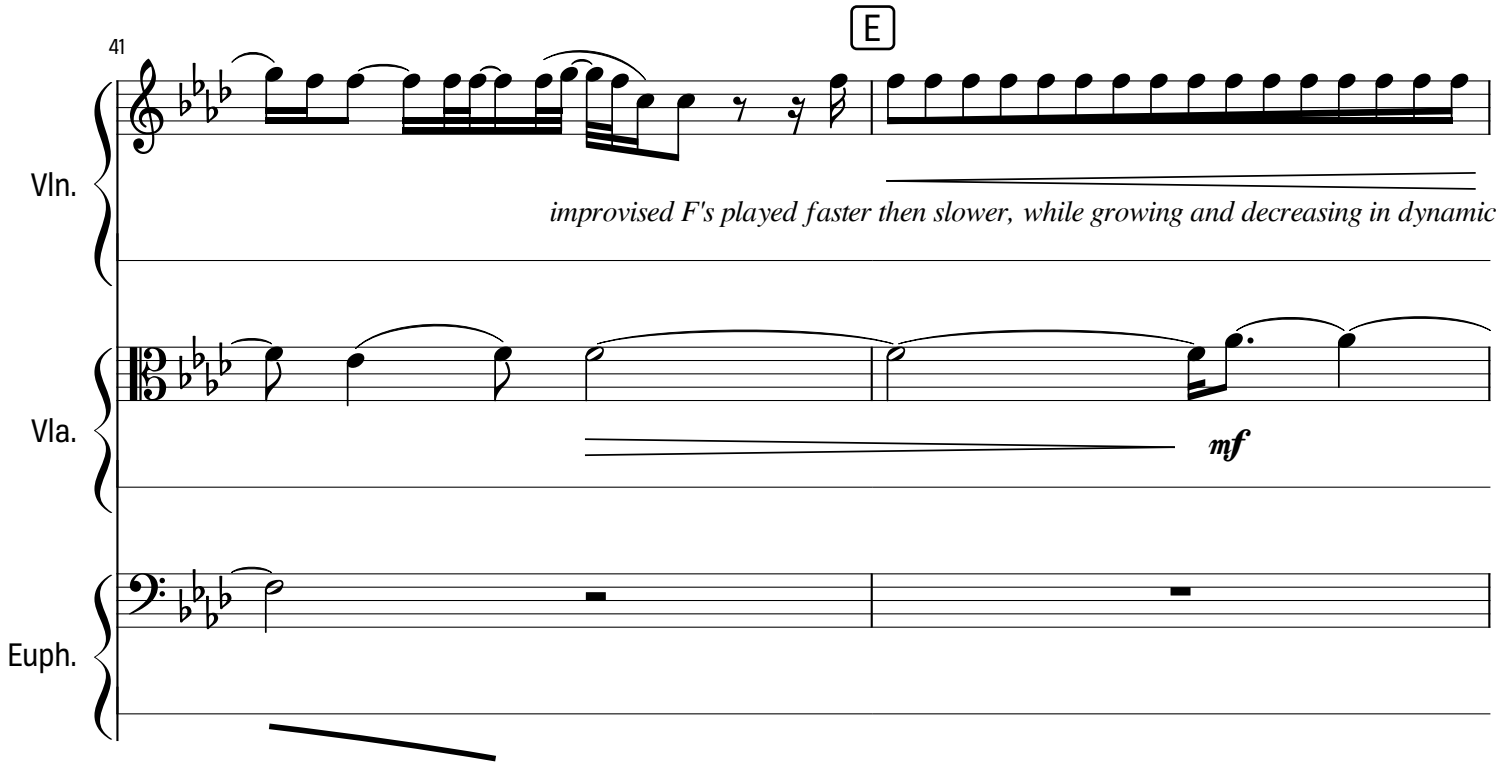
For more information about this work, please contact Brian Lindgren: brian@brianlindgren.com

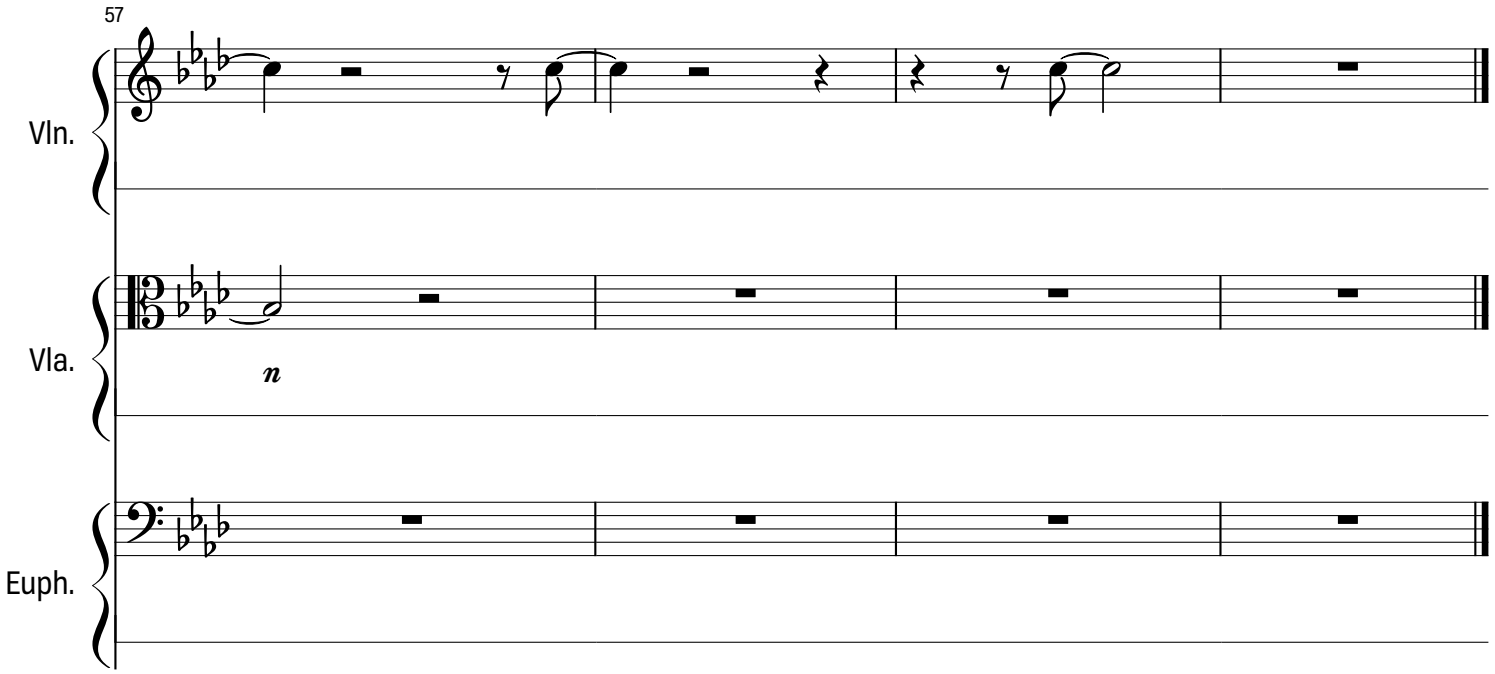
Full Stop

for Processed Violin, Viola and Euphonium (2020)

Brian Lindgren







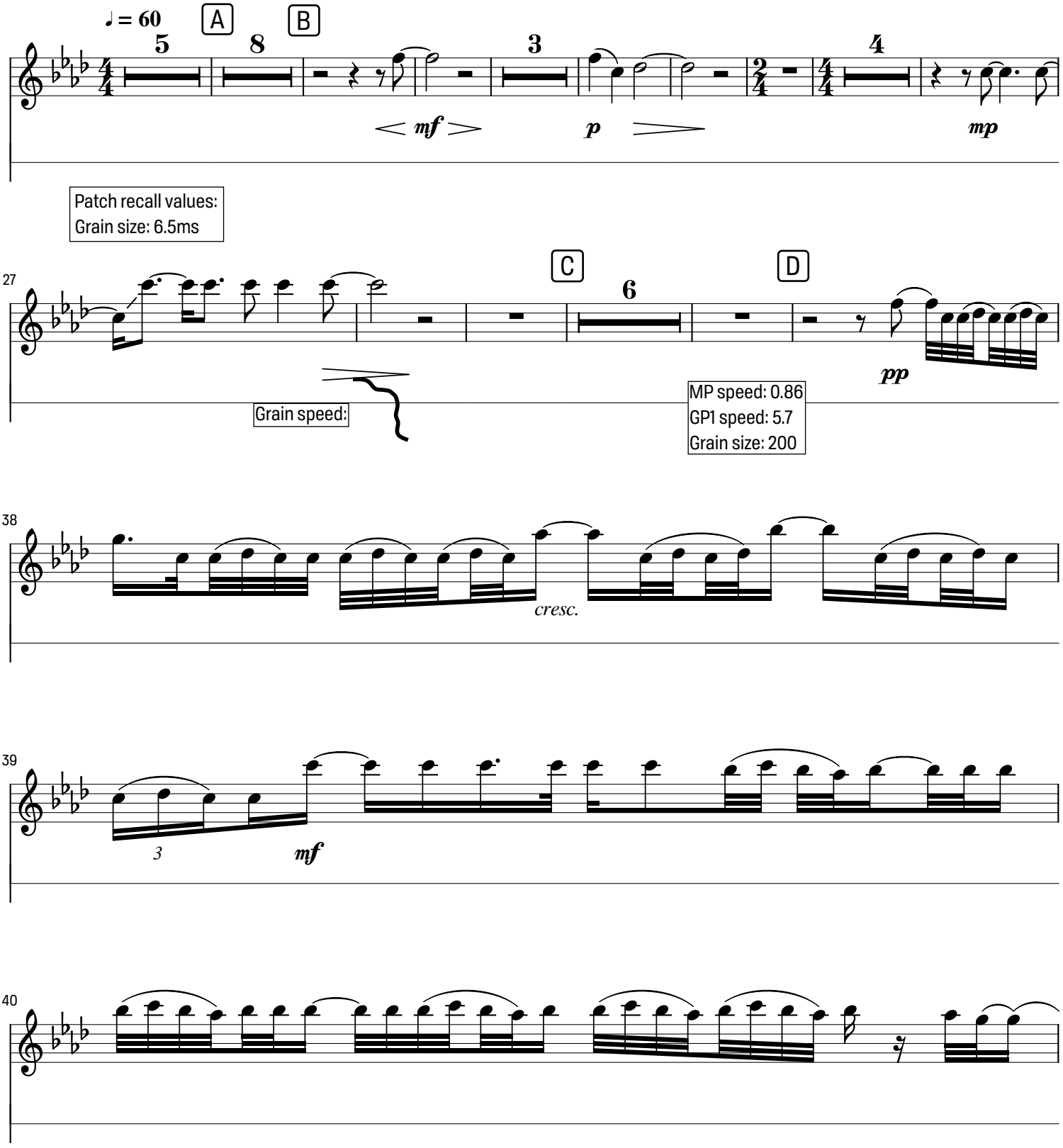
Violin

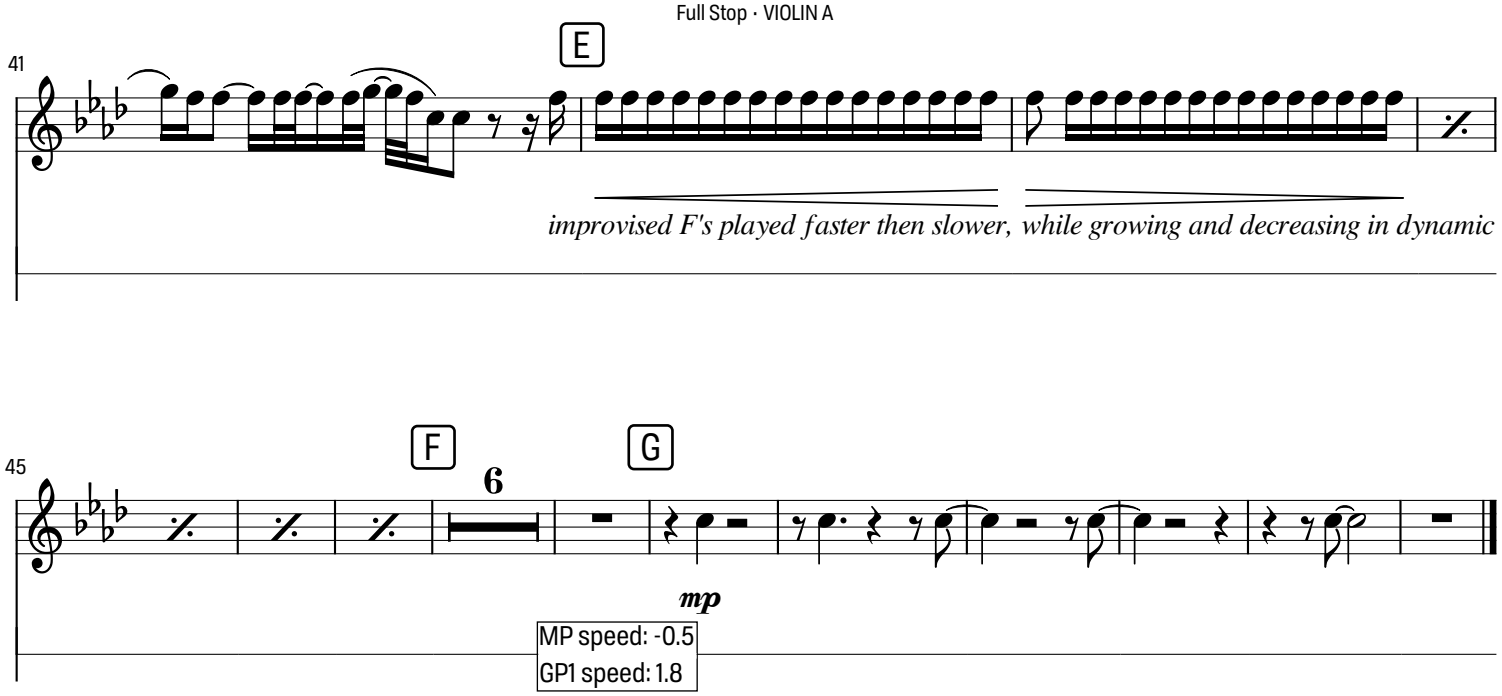
Full Stop

Brian Lindgren

for Processed Violin, Viola and Euphonium (2020)

all phrases emerge from nothing and return to nothing





Viola

Full Stop

for Processed Violin, Viola and Euphonium (2020)

Brian Lindgren

all phrases emerge from nothing and return to nothing

Euphonium

Full Stop

for Processed Violin, Viola and Euphonium (2020)

Brian Lindgren