Additive Synthezier:

Harmonics:

--Up to 8 harmonics can be played at the same time. The user can set the amplitude for each harmonic in the score file.

Generating envelopes:

--The preset envelope structure allocates the initial 10% of a note's duration to attack, the next 40% to decay, followed by 40% for sustain, and the remaining 10% for release.

Supporting polyphony

--Facilitating the simultaneous playback of an arbitrary number of notes.

tested using test001.score

Grading:

10 - Sinusoid playback on demand from the sequencer

20 - Definition of all harmonics

30 - Envelope generation

35 - Polyphony — 35/30 points