

# The multi-tuned piano: keyboard music without a tuning system generated manually or by Deep Improviser

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**Abstract.** A physical synthesis piano, such as one of Pianoteq's series of grand pianos, unlike a physical grand piano is not necessarily constrained at any moment to a single tuning system. The presentation discusses why a system using discrete piano pitches (c.f. sliding pitches) chosen freely amongst the audible pitch continuum presents interesting musical and expressive possibilities. A version of my post-metrical post-tonal machine learning generative system Deep Improviser (under development since 2017), has been adapted and fine-tuned to continuous tuning. Its current state, and generated outputs will be discussed. Brief audio and video examples of algorithmic or machine-generated compositions and an improvisation exploiting the multi-tuned piano demonstrate its potential and a performing interface for it.

**Keywords:** Continuous pitch; tuning systems; the multi-tuned piano; Deep Improviser.

Link to an AV example, Pan Pitches: <http://www.australysis.com/hear-see-read/aLYS-works/worksEAcamp.html#panpitches>

As agreed with the conference chair, this proposed presentation would be represented in the proceedings by title or abstract only. No accompanying full paper will be published there. Musical examples are available, will be presented, and may be linked to the conference/proceedings as required.