References

- [1] Assayag, G., Bloch, G., Chemillier, M., Cont, A., and Dubnov, S. Omax brothers: a dynamic yopology of agents for improvization learning. In *Proceedings of the 1st ACM workshop on Audio and music computing multimedia* (2006), 125132.
- [2] Buchholz, J., Lee, E., Klein, J., Borchers, J., et al. coJIVE: a system to support collaborative jazz improvisation.
- [3] Collins, N. *LL: Listening and Learning in an Interactive Improvisation System.* University of Sussex, unpublished, 2011.
- [4] Collins, N. M. Towards autonomous agents for live computer music: Realtime machine listening and interactive music systems. PhD thesis, Citeseer, 2006.
- [5] Dahia, M., Santana, H., Trajano, E., Ramalho, G., Sandroni, C., and Cabral, G. Using patterns to generate rhythmic accompaniment for guitar. CEP 50732 (2004), 970.
- [6] Davies, M. E., Brossier, P. M., and Plumbley, M. D. Beat tracking towards automatic musical accompaniment. In *Proceedings of the Audio Engineering Society* 118th convention, Barcelona, Spain (2005).
- [7] Franccois, A. R. J., Chew, E., and Thurmond, D. Visual feedback in performer-machine interaction for musical improvisation. In *Proceedings of the 7th international conference on New interfaces for musical expression* (2007), 277280.
- [8] Franccois, A. R. J., Schankler, I., and Chew, E. Mimi4x: An interactive audiovisual installation for high-level structural improvisation. In *Multimedia and Expo* (ICME), 2010 IEEE International Conference on (2010), 16181623.
- [9] Franois, A. R. J., Chew, E., and Thurmond, D. Performer-centered visual feedback for human-machine improvisation. *Computers in Entertainment 9*, 3 (Nov. 2011), 1–13.
- [10] Gifford, T., and Brown, A. R. Beyond reflexivity: Mediating between imitative and intelligent action in an interactive music system. In 25th BCS Conference on Human-Computer Interaction (2011).
- [11] Gifford, T. M., and Brown, A. R. The ambidrum: Automated rhythmic improvisation.
- [12] Gifford, T. M., and Brown, A. R. Anticipatory timing in algorithmic rhythm generation. In *Proceedings of the Australasian Computer Music Conference 2010* (2010), 2128.
- [13] Goto, M. An audio-based real-time beat tracking system for music with or without drum-sounds. *Journal of New Music Research* 30, 2 (2001), 159171.
- [14] Goto, M., and Muraoka, Y. Beat tracking based on multiple-agent architecturea real-time beat tracking system for audio signals. In *Proceedings of the Second In*ternational Conference on Multiagent Systems (1996), 103110.
- [15] Goto, M., and Muraoka, Y. Music understanding at the beat level: Real-time beat tracking for audio signals. *Computational Auditory Scene Analysis* (1998), 157176.
- [16] Hawryshkewich, A., Pasquier, P., and Eigenfeldt, A. Beatback: A real-time interactive percussion system for rhythmic practise and exploration.

- [17] Hoffman, G., and Weinberg, G. Shimon: an interactive improvisational robotic marimba player. In *Proceedings of the 28th of the international conference extended abstracts on Human factors in computing systems* (2010), 30973102.
- [18] Hoffman, G., and Weinberg, G. Interactive improvisation with a robotic marimba player. *Autonomous Robots* 31, 2-3 (June 2011), 133–153.
- [19] Hsu, W. Using timbre in a computer-based improvisation system. In *Proceedings* of the ICMC (2005), 59.
- [20] Jensen, K., and Andersen, T. Real-time beat EstimationUsing feature extraction. Computer Music Modeling and Retrieval (2004), 155178.
- [21] Kitahara, T., Ishida, K., and Takeda, M. ism: improvisation supporting systems with melody correction and key vibration. In *Entertainment Computing-ICEC 2005*. Springer, 2005, 315327.
- [22] Kitani, K. M., and Koike, H. Improvgenerator: Online grammatical induction for on-the-fly improvisation accompaniment. In *Proceedings of the 2010 Conference on New Interfaces for Musical Expression (NIME 2010)* (2010).
- [23] Krakowski, S., Velho, L., Pachet, F., and Sony, C. S. L. Pandeiro funk: experiments on rhythm-based interaction. In *ACM SIGGRAPH 2009: Music & Audio* (2009), 1.
- [24] Levitt, D. A. A melody description system for jazz improvisation thesis.
- [25] Lewis, G. E. Too many notes: Computers, complexity and culture in voyager. Leonardo Music Journal (2000), 3339.
- [26] Lim, A., Mizumoto, T., Cahier, L.-K., Otsuka, T., Takahashi, T., Komatani, K., Ogata, T., and Okuno, H. G. Robot musical accompaniment: integrating audio and visual cues for real-time synchronization with a human flutist. In *Intelligent Robots and Systems (IROS)*, 2010 IEEE/RSJ International Conference on (2010), 19641969.
- [27] Mizumoto, T., Takeda, R., Yoshii, K., Komatani, K., Ogata, T., and Okuno, H. G. A robot listens to music and counts its beats aloud by separating music from counting voice. In *Intelligent Robots and Systems*, 2008. IROS 2008. IEEE/RSJ International Conference on (2008), 15381543.
- [28] Morris, D., Simon, I., and Basu, S. Exposing parameters of a trained dynamic model for interactive music creation. In *Proceedings of AAAI* (2008).
- [29] Mulvihill, D. RENI: real time beat tracking and metrical analysis.
- [30] Murata, K., Nakadai, K., Takeda, R., Okuno, H. G., Torii, T., Hasegawa, Y., and Tsujino, H. A beat-tracking robot for human-robot interaction and its evaluation. In Humanoid Robots, 2008. Humanoids 2008. 8th IEEE-RAS International Conference on (2008), 7984.
- [31] Murata, K., Nakadai, K., Yoshii, K., Takeda, R., Torii, T., Okuno, H. G., Hasegawa, Y., and Tsujino, H. A robot singer with music recognition based on real-time beat tracking. *Proc. of ISMIR 2008Session 2bMusic Recognition and Visualization* (2008), 199204.
- [32] Nikolaidis, R., and Weinberg, G. Playing with the masters: A model for improvisatory musical interaction between robots and humans. In *RO-MAN*, 2010 IEEE (2010), 712717.

- [33] Oliveira, J. L., Gouyon, F., Martins, L. G., and Reis, L. P. IBT: a real-time tempo and beat tracking system.
- [34] Pachet, F. The continuator: Musical interaction with style. In *Proceedings of*, vol. 1001 (2002), 211218.
- [35] Pachet, F. Interacting with a musical learning system: The continuator. *Music and Artificial Intelligence* (2002), 103108.
- [36] Pan, Y., Kim, M. G., and Suzuki, K. A robot musician interacting with a human partner through initiative exchange. In *Proceedings of the Conference on New Interfaces for Musical Expression (NIME10)* (2010), 166169.
- [37] Pardo, B., and Birmingham, W. Modeling form for on-line following of musical performances. In *PROCEEDINGS OF THE NATIONAL CONFERENCE ON AR-TIFICIAL INLIGENCE*, vol. 20 (2005), 1018.
- [38] Rego, S. K. C. Rhythm-controlled automata applied to musical improvisation.
- [39] Rowe, R. The aesthetics of interactive music systems. *Contemporary music review* 18, 3 (1999), 8387.
- [40] Simon, I., Morris, D., and Basu, S. MySong: automatic accompaniment generation for vocal melodies. In *Proceedings of the twenty-sixth annual SIGCHI conference on Human factors in computing systems* (2008), 725734.
- [41] Stark, A. M., and Plumbley, M. D. Performance following: Real-time prediction of musical sequences without a score. *IEEE Transactions on Audio, Speech, and Language Processing* 20, 1 (Jan. 2012), 190–199.
- [42] Taki, Y., Suzuki, K., and Hashimoto, S. Real-time initiative exchange algorithm for interactive music system. In *Proceedings da Internacional Computer Music Conference (ICMC)* (2000).
- [43] Toiviainen, P. Real-time recognition of improvisations with adaptive oscillators and a recursive bayesian classifier. *Journal of New Music Research* 30, 2 (2001), 137147.
- [44] Van Nort, D., Braasch, J., and Oliveros, P. Mapping to musical actions in the FILTER system.
- [45] Van Nort, D., Braasch, J., and Oliveros, P. A system for musical improvisation combining sonic gesture recognition and genetic algorithms. In *Proceedings of Sound and Music Computing Conference*, Porto, Portugal (2009).
- [46] Verma, P., and Rao, P. Real-time melodic accompaniment system for indian music using TMS320C6713. In VLSI Design (VLSID), 2012 25th International Conference on (2012), 119124.
- [47] Walker, W., and Hcbcl, K. ImprovisationBuilder: improvisation as conversation william walker, kurt hebel, salvatore martirano, carla scaletti CERL sound group & school of Music/University of illinois 252 engineering research laboratory/103 s. Mathews/Urbana IL 61801-2977/USA telephone:(217) 333-0766 email: walker@ cs. uiuc. edu. In Proceedings of the... International Computer Music Conference (1992), 190.
- [48] Walker, W. F. A computer participant in musical improvisation. In *Proceedings of the SIGCHI conference on Human factors in computing systems* (1997), 123130.

- [49] Weinberg, G., and Driscoll, S. Jamaa a middle eastern percussion ensemble for human and robotic players. In *Proceedings of the SIGCHI conference on Human Factors in computing systems* (2006), 12291232.
- [50] Weinberg, G., and Driscoll, S. Robot-human interaction with an anthropomorphic percussionist. In *Proceedings of the SIGCHI conference on Human Factors in computing systems* (2006), 12291232.
- [51] Weinberg, G., and Driscoll, S. Toward robotic musicianship. Computer Music Journal 30, 4 (2006), 2845.
- [52] Weinberg, G., and Driscoll, S. The design of a robotic marimba player: introducing pitch into robotic musicianship. In *Proceedings of the 7th international conference on New interfaces for musical expression* (2007), 228233.
- [53] Weinberg, G., and Driscoll, S. A leader-follower turn-taking model incorporating beat detection in musical human-robot interaction. ACM Press (2007), 97.
- [54] Weinberg, G., Driscoll, S., and Parry, M. Musical interactions with a perceptual robotic percussionist. In Robot and Human Interactive Communication, 2005. RO-MAN 2005. IEEE International Workshop on (2005), 456461.
- [55] Weinberg, G., Godfrey, M., Rae, A., and Rhoads, J. A real-time genetic algorithm in human-robot musical improvisation. *Computer Music Modeling and Retrieval. Sense of Sounds* (2008), 351359.
- [56] Weinberg, G., Raman, A., and Mallikarjuna, T. Interactive jamming with shimon: a social robotic musician. In *Proceedings of the 4th ACM/IEEE international conference on Human robot interaction* (2009), 233234.
- [57] Young, M. NN music: Improvising with a LivingComputer. Computer Music Modeling and Retrieval. Sense of Sounds (2008), 337350.
- [58] Young, M. W., Bown, O., et al. Clap-along: A negotiation strategy for creative musical interaction with computational systems. In *Proceedings of the International Conference on Computational Creativity 2010* (2010), 215222.