

New Technology in Music and Creative Entertainment Presentation

Kyarah Boon

Module: New Technology in Music and Creative Entertainment

Student Number: 1900269

Lecturer: Zohe Mustafa

Date: 27/04/2020



What is AIVA Technology?

- * Composes emotional soundtracks for films, video games, commercials and any type of entertainment content.
- * Reads through a large collection of music partitions, written by some the greatest Composers in order to create a mathematical model representation (AIVA, 2016).
- * AIVA was co-founded in 2016 by two brothers Pierre and Vincent Barreau.

AIVA

artificial intelligent virtual advisor

Pierre Barreau

Vincent Barreau



What is A.I & How Is It Changing the Music Industry?



- * Businesses are being reshaped by technology, and those in the music industry are no exception.
- * 70% of companies will have adopted at least one A.I technology by 2030 (Marr, Forbes, 2019).
- * A.I analyses data from different compositions when it creates musical pieces.
- * Reinforcement learning is used in algorithm learning what characteristics and patterns create music that is enjoyable or that mimics a certain genre (Machuron, 2016)

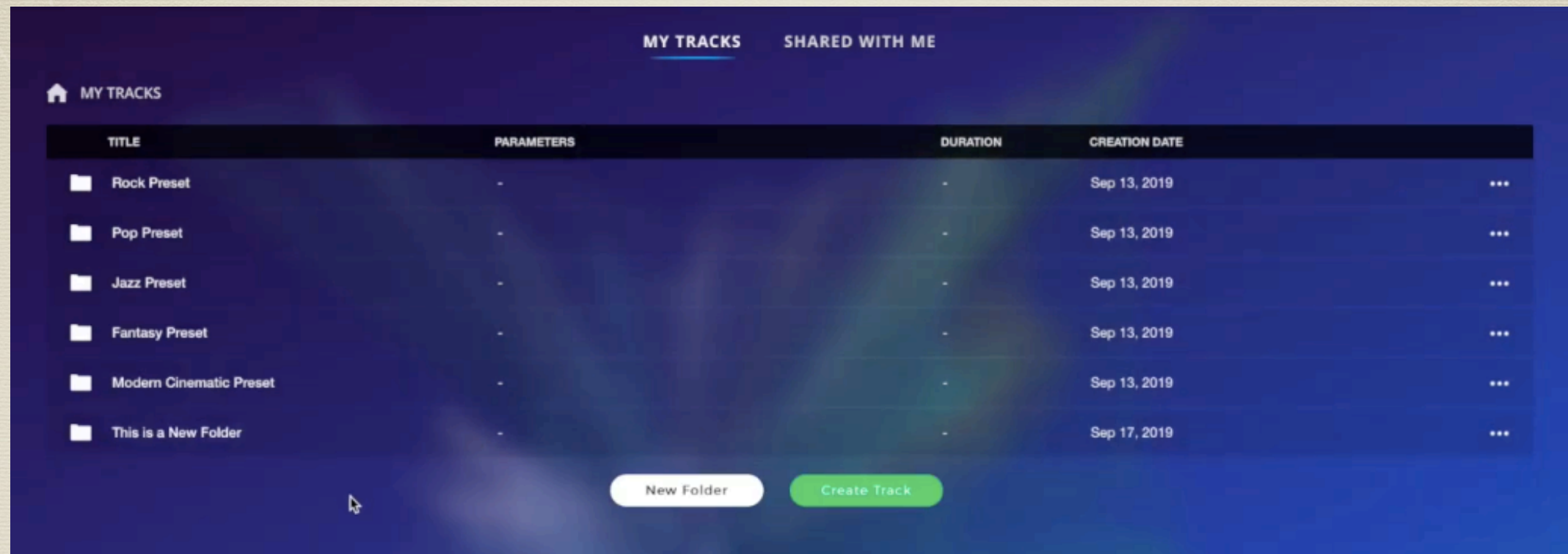
Composing with Genetic Algorithms

- * AIVA makes properties evolve through processes comparable to the process of genetic mutation and chromosome crossovers to create new properties (AIVA Technologies, 2018).
- * In music, those criteria are the rules of the style of music that they want the A.I to compose in.
- * Finally, the 'fitter' scores are selected according to those criteria, and AIVA can repeat this process until the evolutionary system produces pleasing results.

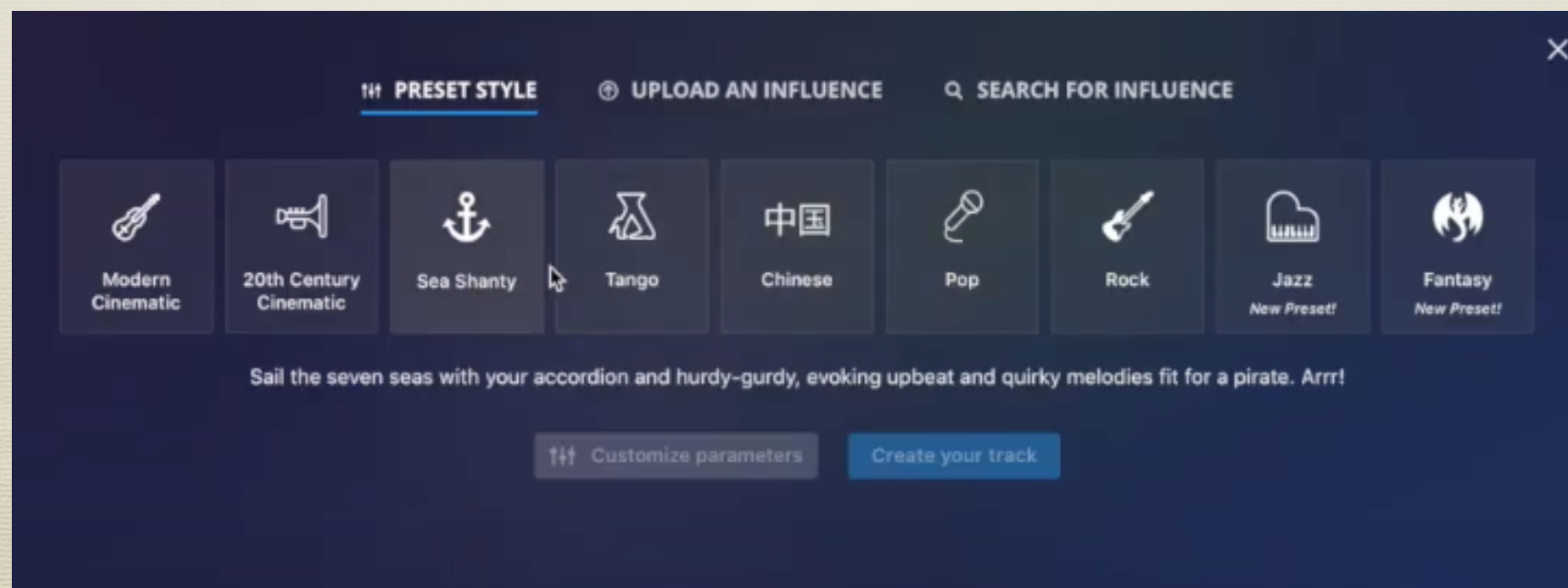


How AIVA Works

Appendix A

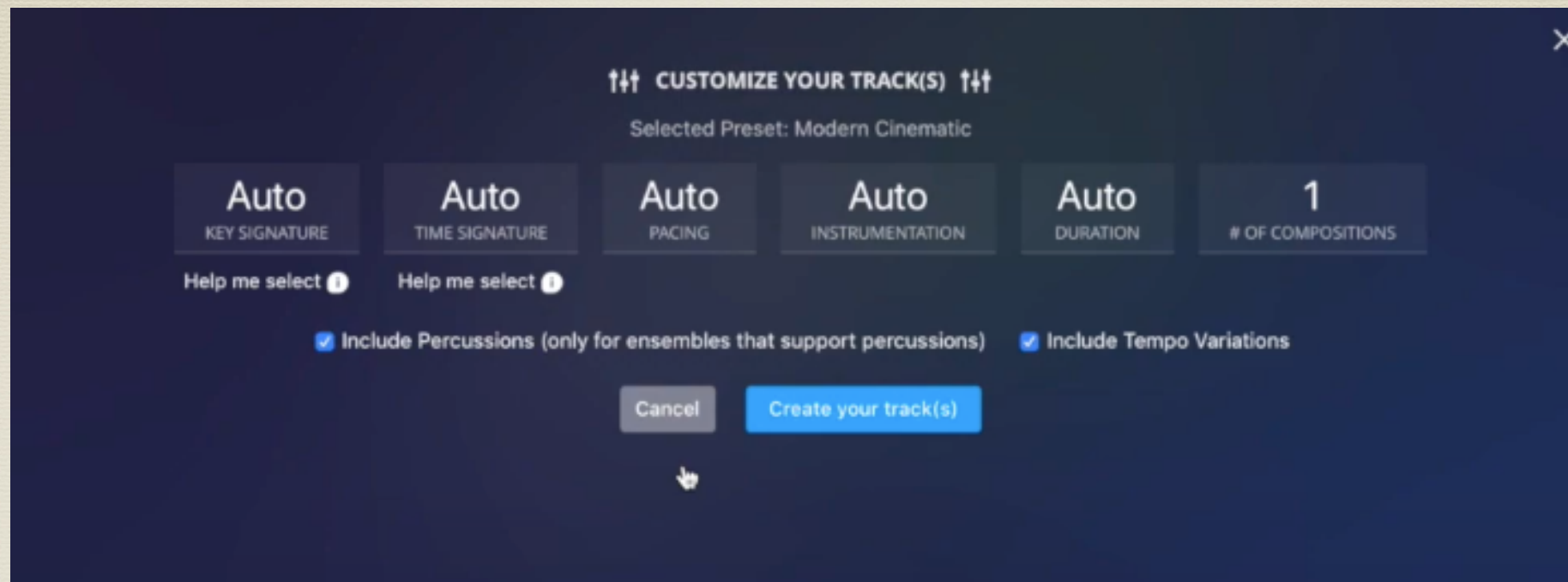


Appendix B

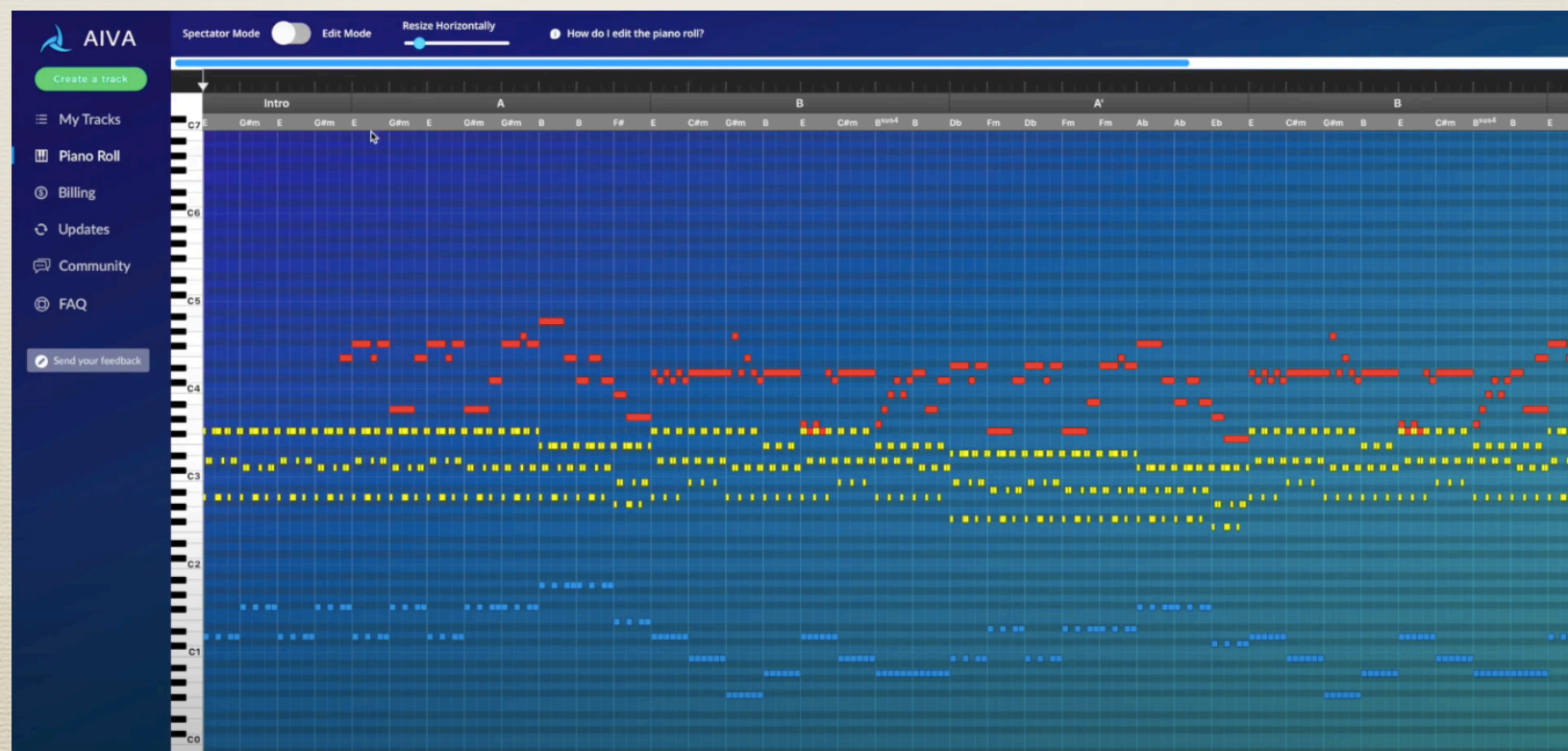


How AIVA Works

Appendix C

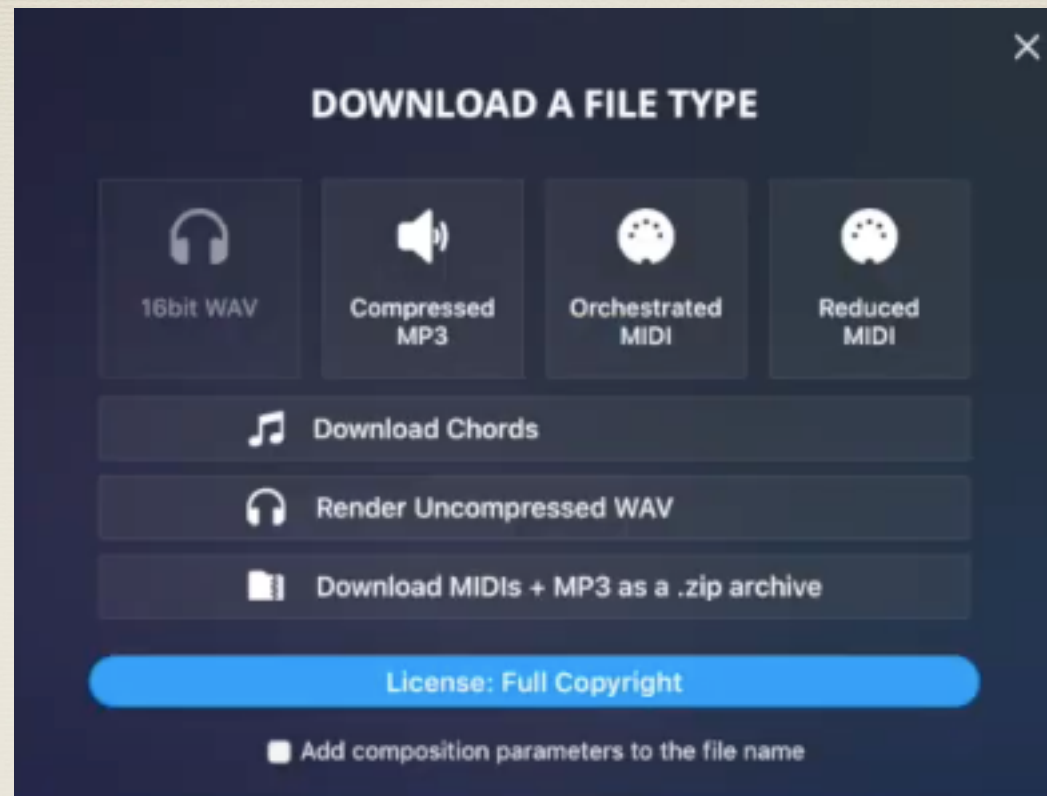


Appendix D



How AIVA Works

Appendix E



- * Compose with Influencers

- * Create a similar composition with emotional impacts as another existing score,

AIVA Pricing

Pricing for Individuals

Free

(No Credit Card required)

- Unlimited track creation
- 3 downloads per month
- No downloads for Pop & Rock
- Non-Commercial License
- Copyright owned by AIVA

Create an Account

Standard Annually

€14 p/month, billed yearly

- Unlimited track creation
- Unlimited downloads
- Downloads for Pop & Rock
- Non-Commercial License
- Copyright owned by AIVA

Create an Account

Pro Annually

€39 p/month, billed yearly

- Unlimited track creation
- Unlimited downloads
- Downloads for Pop & Rock
- Commercial License
- Full Copyright Ownership

Create an Account

* Students & Schools

- * Students and Schools can benefit from a 30% discount on their annual plans and a 15% discount on the monthly plans.

* Enterprises

- * Creative companies which need complete flexibility, and intend to heavily commercialise the music created with AIVA, should contact the company for further information.

AIVA Licensing

- * Free Plan Licensing

- * Allowed to use the tracks that are created under a Free plan for non-commercial purposes.
- * The copyright of the tracks you create is owned by AIVA and you MUST give credit to AIVA when using the track.

- * Standard Plan Licensing

- * The same rules as the Free Plan apply, except that you DO NOT need to give AIVA credit.

- * Pro Licensing

- * The copyright of the tracks you created is owned by YOU. This means you can use the tracks in ANY way that you like, for as long as you are using AIVA as an individual, and not a corporation.



They Trust ALVA to Create Their Music.



Bibliography

- * Barreau, Pierre, and Vincent Barreau. "AIVA About." *About AIVA*, 2016.
- * Healy, Amber. "Meet AIVA, the World's First AI Music Composer." The Geeks and Beats Podcast with Alan Cross and Michael Hainsworth, 6 Feb. 2018.
- * Lauder, Ed. "Aiva Is the First AI to Officially Be Recognised as a Composer." *The World's Number One Portal for Artificial Intelligence in Business*, 9 Nov. 2018.
- * Machuron, Charles. "AIVA: The Artificial Intelligence Composing Classical Music." *Silicon Luxembourg*, 8 Apr. 2016.
- * Marr, Bernard. "The Amazing Ways Artificial Intelligence Is Transforming The Music Industry." *Forbes*, Forbes Magazine, 9 July 2019.
- * Technologies, Aiva. "How We Used Our Music Engine to Create the First AI-Generated Album of Chinese Music." *Medium*, Medium, 14 Sept. 2018.
- * "What Is Artificial Intelligence? How Does AI Work?: Built In." *What Is Artificial Intelligence? How Does AI Work? | Built In*, 2018.