**IADT Creative Music Production**

**Professional Project**

**Robert Carrie**

# How Complex is Too Complex for Popular Music?

**Submitted 26/04/2024.**

**Barry O'Halpin**

Declaration

I hereby certify that the material, which I now submit for assessment on the programmes of study leading to the award of BA(Hons) in Creative Music Production, is entirely my own work and has not been taken from the work of others except to the extent that such work has been cited and acknowledged within the text of my own work. No portion of the work contained in this thesis has been submitted in support of an application for another degree or qualification to this or any other institution.

I have used the IADT library referencing guidelines (available at https://iadt.libguides.com/referencing) and/or the appropriate referencing system recommended in the assignment guidelines and/or programme documentation.

I understand that the IADT regards breaches of academic integrity and plagiarism as grave and serious.

By signing this form or by submitting material for assessment online, I confirm that I have read and understood the IADT Academic Integrity Policy (available at https://iadt.ie/wp-content/uploads/2024/03/Academic-Integrity-Policy-V1-2024.pdf).

ROBERT CARRIE 24/04/24

_____ _____

Signature of Candidate Date

## Abstract

Nowadays most popular music one sees on the charts is taken up by the same genres such as pop, EDM, and hip hop, while music that used to be popular like jazz and classical cannot be found. This type of music and more niche genres contain more experimentation in its songwriting than the average song one would find in the charts. The purpose of this project was to see if these complex genres could ever get mainstream appeal again or if they will always be held back by their songwriting tropes, and finding this out required reviewing a general listening audience's reaction to the songwriting aspects that make up these genres. This project was carried out by two methods: songwriting and surveying. Songwriting consisted of composing 5 instrumental pieces, with the first piece containing the tropes that are basic and least challenging that are found in popular music. From there every song would add more complex musical techniques than the previous, like changing the time signature, playing chords outside the key, and adding more abrasive timbre to each instrument. This would result in creating a spectrum of pieces, from least to most complex. Surveying required having a listening audience answer questions based on the five pieces to gather data about which pieces they liked and disliked, which aspect of each piece they did or did not enjoy, and their opinions about current popular music. The results showed most participants value rhythm and timbre over any of the other aspects of the pieces and enjoyed the pieces that were not too experimental regarding those aspects. However, a good majority of them found experimentation in other aspects intriguing and would rather that instead of the more predictable melodies or harmony. A lot of them were also critical of the standard of current pop music as it all sounds similar. The main conclusions drawn were that regardless of musical aspects and techniques the average listener will welcome musical complexity into popular music if the techniques blend well with the rest of the music, which could mean complex genres have a chance at becoming popular again by mixing their songwriting tropes with popular music.

Contents

## Introduction

Music is an ever-changing form of media, and with changing media comes different genres coming in and out of popularity. This means genres that were popular in the previous centuries are not very prevalent in today's mainstream in the 21st, such as jazz or classical. The genres that do include pop, country, EDM, and hip hop, as they take up most of the positions on the charts (Trust, 2023). These genres are all different in their ways but classical and jazz on average tend to feature more musical complexity in terms of harmony, melody, rhythm, and timbre than your average pop song one would find sitting on the Hot 100. Even more current experimental genres like ambient or electronic music that have never had a consistent mainstream presence in music share timbres and textures that are different from more chart-friendly genres (Hope). The purpose of this research project is to explore how complex can a piece of music like the ones found on the charts get and see if techniques from these complex genres are welcomed by a general listening audience. The reason for this study is to find out if any of these non-conventional genres of music or their tropes will ever chance to become or return to the mainstream or appear frequently in the mainstream. This project is carried out by making a short piece that features conventional pop aesthetics and songwriting and then making four more versions of that piece, with each version featuring more and more songwriting tropes and timbres from more complex genres, creating a spectrum of instrumentals going from most to least experimental. From there a survey is conducted asking listeners various questions about the pieces, with the most important being asking them to rank from their favourite to least favourite version. This project is valuable as it shines light on the disparities between genres as some get highlighted more than others in the mainstream.

This thesis is broken up into a literature review, methodology, analysis, and discussion. The literature review will analyze other people's works in this area to better understand the specifics of this project. The methodology will look at how the project is to be carried out through different methods and justify these methods. The analysis will analyze both the work that was done and the results from that work and then the discussion will interpret those results and see how they contribute to the understanding of the topic.

# Literature Review

## Introduction

This topic investigates the idea of genre and songwriting as it pertains to audience consumption. When referring to pop music in this project, it means popular Western genres like country, rock, rap, pop, and electronic. When referring to complex music, it means classical, jazz, ambient, and experimental electronic. Many sub-genres can fit into this category, like witch-house, shoegaze, vaporwave, etc (Sherburne). However, for this project, it is best to stick with non-popular genres that people are aware of, which also means for this field of research the project will be sticking to Western music only. To properly understand this entire thesis, it is vital to look at resources that relate to popular and complex genres and discuss the specifics within them. This will be split up into four sections: popular music theory, the complexity of popular music, complex music theory, and the public perception of both.

## Theory of Popular Music

When a genre is consumed so much that it reaches "popular" status, or "becomes pop music", it is important to know the songwriting behind these songs so the techniques can be used for future chart hits. Dave Carlton looks at this in a literal sense. Taking from 1300 courses and verses of songs that appeared on the Billboard 100, he finds out the popularity of certain chords and chord progressions in these chart songs and the relationships that different chords have with one another. This article is influential for the project as it implies the idea that certain genres that appear on the charts tend to share the same type of songwriting and serve as a starting point for how the first piece is written. While not a scholarly source, this article expresses why the average listener might gravitate towards these songs with these compositions more than a genre that breaks from these conventions. He does not paint all popular songs as the same, however, and even gives examples of when these tropes are broken. *"Even though it's true that there are a lot of songs that stick to just four chords, this definitely isn't universal. There's lots of examples in "popular" music that are really rich harmonically."* (Carlton).

This type of analysis has been occurring for years now, due to how important it is to understand how pop songs are as catchy as they are. For example, in this source from Richard Middleton from 1993, he analyzes the process of analyzing popular music and how some aspects of notation

are easier to depict depending on the song while critiquing how often popular music studies lack mainstream methods to them, as musicology is ever-changing. He goes on to analyze "Where's the Party" by Madonna and other popular songs in detail, going over things like call and response, harmony and rhythm, and verse/chorus structure. The author even expands on this and reveals how reactions to the song (like dancing) can help reveal musical structure, and why a danceable song is more appealing to the mainstream. *"But looking round our present musical culture, popular songs seem to provide a good place for experimental attempts at analysis to start - simply because, as common-sense interpretation tells us, 'movement' is usually so important"* (Middleton 178). This is useful for the project as it shows insight into how dance-oriented pop music manages to have a more physical effect on the listener, with those analyzed techniques being utilized within the pieces.

### Complexity of Popular Music

While the point is made that most pop songs can feel involved in the same tropes, there still are many pop songs that are rich harmonically. Panel Collaros touches on this as he investigates The Beatles' songwriting. He picks examples from The Beatles' discography that are striking, easily demonstrable, or useful. For example, he takes the song "Piggies" and talks about how it starts in a major key but turns towards the parallel minor at the very end which does not recover (Collaros 56). This resource is old however serves the project as it shows how complex harmonically a pop rock band like The Beatles was able to get while still being popular in the era of the 60s, which in return gives a guide on how to navigate in between both ends of the spectrum (more so towards the pop end), so the pieces are accurate in the gradual slope of complexity.

With many popular bands breaking away from conventional tropes, one of the most infamous examples of this is when Radiohead released their 4th studio album *Kid A* in 2000. They have had complex theory in many of their records before this, but timbre-wise *Kid A* was pushing the boundaries for a mainstream rock band. *"Musical sparring between voice and instruments on Kid A can be parsed into the binary oppositions of nature versus technology, sense versus nonsense, and music versus noise"* (Letts 44). This text is from the book "*Radiohead and the Resistant Concept Album: How to Disappear Completely*" by Marianne Tatum Letts. Immediately after the text on page 45 she showcases a table of elements from the first 5 songs of the record and breaks

them into categories of organic vs technological sounds and musical and noise elements. This is to showcase how the band took musical elements and blended them with more experimental timbres from complex subgenres. This resource might not be relevant in touching on today's standard for popular music, but it is incredibly useful as it shows how far one can push musical ideas and still be a mainstream success, and how it has been done beforehand. It also has insight into the blend between different timbres being put into one song, something that happens throughout each piece. Both articles point out the different methods of being complex in the mainstream, and how it has progressed through the years. The Beatles used arbitrary harmony relative to the time to stand out, while Radiohead does the same but also uses arbitrary timbre to stand out, which is a direction a lot of current music seems to take with the digital process a lot of it is being made by.

Sometimes a piece of music can gain notoriety because of how complex the songwriting is. "Giant Steps" by John Coltrane is a famous example of this due to how difficult it is to understand what is happening harmonically without analyzing it. *"Each pass tonicizes its keys one per measure via an intervening dominant chord. In contrast, the second half of the composition tonicizes its keys upwards. Initiated by the ii-V progression at measure 8"* (Waters 139). In this article Keith Waters explains how Coltrane was employing "ic4[1] harmonic cycles" into his chord progressions. In this quote, he refers to how in *Giant Steps,* Coltrane would resolve to a different key going downwards for the first phrase of eight bars and in the second phrase of eight bars it would resolve upwards in the same fashion. Walters also mentions how these key changes would happen at different intervals in each phrase, with the first phrase changing keys every bar and the second phrase changing keys every two bars. He includes a quote from Lewis Porter about how *Giant Steps* "knocked the jazz world on its ear" at the start of the text, which would go on to explain how these rapid key movements that use the classic "ii-V-I" jazz progression were unheard of at this time, giving the piece its infamous reputation that still holds today. This serves the project as it inspires the techniques the more complex side of the spectrum is using.

[1] Ic4- four semitones, in this context resolving to a key 4 semitones from the original

This shows that experimentation in popular music has changed over the years, and likely will change again as time goes on, which is relevant to what the project is investigating.

## Theory of Complex Music

To mix both complex and popular music, it is equally as important to understand the songwriting ideas and the music theory behind more Avant Garde and experimental genres as it is to understand ones in popular music. For this, it is important to look at works that would be benchmarks in the world of these genres. This text by Boothroyd focuses on the harmonic specifics behind *Kind of Blue* by Miles Davis and focuses on modal jazz as a concept of expressing these harmonic ideas. It goes past the rudimentary description of modal jazz and gives an analysis of its purpose and how it gave Miles true improvisation improvisational freedom when he was playing. "*Modal jazz can be defined straightforwardly: it exists when the rhythm section plays a single harmony for an extended period while the soloists improvise based on a scale (or mode) associated with that chord."* (Boothroyd). The article later goes on to reference how certain root chords sound with certain tetrachords[2] and leading tones. This text is helpful as it gives a framework for how the project incorporates improvisation into melodies and how harmony functions in the composition of complex pieces. The text explains how this way of playing jazz abandons the common concept of a ii-V-I to explore different melodies over single long harmonies, which gives insight into how experimentation in complex genres does not need to be pre-determined and how the project utilizes this method in the pieces written for it.

A fundamental in complex music where rhythm is concerned is the idea of syncopation.

*The syncopations of Jazz are often regular and monotonous, and it may be that this is due to a different conception of up-beats and down-beats. The upward lift, as opposed to the downward beat, is surely what gives Jazz its bounce.* (Blacking)

This quote by John Blacking was used in the text by Matthew Butterfield, which delves into rhythm in jazz. He goes into detail about what swing is and how a full jazz ensemble band is supposed to swing with each other, and he gives some insight into different types of syncopation with the drones, swing ratio variants between instruments, and also there being an alpha rhythm

[2] Tetrachord- A four note chord

instrument that all the other instruments are supposed to swing to because if all the instruments were swinging, one would not know where the fundamental rhythm is (Butterfield). This is useful for the project as when it comes to more complex rhythms throughout the spectrum of the pieces, the versions are experimental in a way that makes sense and is coherent to the listener.

## Public Perception of Both

Having a perspective on the modern state of both these types of music in the public eyes is important as it shows how complex and popular music is consumed, which can explore ideas about their future and whether they are stuck in their current positions to ever change in popularity. Seeing their other qualities outside of songwriting gives great insight into how the project pieces are perceived by the people listening to them. This resource by Roy Shuker looks at popular music through the lens of a social and cultural way rather than a musical way, through the medium of going into depth on certain concepts that surround popular music. Some sections give information about the consumerism of popular music and the social perceptions of other genres. For example, the information under "Avant Garde; Experimental" talks about how pushing the boundaries of normal music can limit your commercial potential but create something of a cult following (Shuker, 24). *"Audiences: Consumers"* gives insight into how different ages of listeners impact the role of popular music, and how popular music can change over time. This influences the project in a way that can display the psychology of a mainstream audience and how they consume both popular and avant-garde music.

That article speaks more generally in comparison to Gerald Early and Ingrid Monson. This text looks at jazz through the scope of learning about the genre by finding out how it gained its popularity and why it is not as popular today. It delves into many things including how artists like John Coltrane and Miles Davis always used the improvisational style of playing to how it has been promoted and marginalized by different political ideologies. It compares the state of jazz back then to the state of jazz now and the public's perception of it which is very useful for the project. "*Jazz has always sought a popular audience with varying success but, since its earliest days, it has been a music that is often performed by musicians for musicians."* (Early, Monson 7). The authors describe jazz as possibly a genre that is "*trapped in the memory of itself*" (7) and are being shadowed by genres that evolved from it like R&B. It talks about the idea that jazz has become

less popular due to the genre being less “anti-establishment” and more of an art form to be preserved. However, the authors acknowledge that it lives through fusion artists like Robert Glasper and Kamasi Washington through a new synthesis of the genre that will attract new audiences in the future. This article analyses the legacies of jazz and its future to come through the public perception from then until now. Both these sources give an overview of how both types of genres operate in the mainstream, which gives the project information on them going further than their songwriting.

## Conclusion

All the sources that are presented through these themes help understand popular and complex music theory and the mainstream perception of both. When creating the spectrum of songs and writing up the survey, the information from the references influences the process of the methodology.

# Methodology

## Introduction

From getting perspective about this research topic from other sources, the next step is to plan how to project is going to be carried out. This project aims to find out how much one can take from complex genres and put the attributes into a song based on a popular genre and see how the listener reacts to them. The methodology is designed to direct this goal directly. This methodology was to be taken as a guide rather than a strict plan as things could have potentially changed in the future, taking inspiration from sources used in the literature review.

## Method 1: Song Writing

The method of composing 5 instrumentals is important as it was used as stimuli for the survey which is what the quantitative and qualitative data is based on. The project was carried out in this manner to see how the survey participants reacted to the songs getting more complex. This information shows which techniques or timbre of a particular version may have turned the listener off or perhaps the opposite with a version they preferred.

Getting to actual composition and having the ideas from the genres the pieces are trying to blend be present was essential. The reason for this approach is that when the listener gets to the middle area of the spectrum, the blend of popular and complex needs to have enough of both so they can decide on what they do or do not find appealing about that version. In Butterfield's article, there's an emphasis on how crucial swing is in the genre of jazz.

*The syncopations of Jazz are often regular and monotonous, and it may be that this is due to a different conception of up-beats and down-beats. The upward lift, as opposed to the downward beat, is surely what gives Jazz its bounce* (Butterfield 322).

So, to represent that fundamental of jazz throughout the spectrum, the songs should swing more as the song versions get more complex. Applying this logic to the spectrum, the third piece has most of the drums on time while one of them is distinctly off-grid, in contrast to most of the percussion having swing in the later songs. This can apply to any of the complex genres and aspects that get mixed as well. When dealing with the composition of the pieces, it was important to have them be equally as different from each other as they could. For example, the

first piece being a regular pop song leaping to the second being a blatant jazz song would have been a very stark change for the listener and would not have given specific information as to why they liked/disliked one version over the other. There needs to be clarity through how the song changes as more attributes are introduced. This can be achieved by taking some attributes from a genre but using them in a way that the listener would not find too jarring. In Pandel's article, he touches on how The Beatles do something similar in "A Hard Day's Night". "*Extended tertian harmony appears throughout jazz, but in The Beatles its usage provides a less jazz field than the impression of colour á la Debussy"* (Collaros 59). Tertian harmony being implemented within the pieces to make the chords used sound richer is a fundamental way to have them sound more abstract. One way it is implemented in the project is by taking a popular chord progression like the "I-V-vi-IV" (Carlton) and extending them by thirds to various degrees, so it could later look something like "Imaj7, Vadd9, iv13, IV#11". A specific example is shown in the same text, where the author describes the harmony of the song "*Something*".

EXAMPLE 16. Harrison, "Something." On *Abbey Road*, track 2, 0:00–0:04.
Harmonic analysis of introduction

Time signature is $\frac{4}{4}$

| Beats: | \| | / | / | / | / | \| |
|---|---|---|---|---|---|---|
| Harmonic analysis: C: | IV | | ♭III | VI | (I) | |

*Fig. 1. The Music of the Beatles in Undergraduate Music Theory Instruction, page 66}*

As seen in Fig. 1, the song starts on the IV and goes to flatted major III, which gives a chromatic feel when going to the V6/4 chord, which then leads back to the root chord. This shows the unique nature of the song and how it leads into the first verse, instead of normally starting the verse. Techniques like this inspired the project to bridge each song version in a digestible way for the listener. Like using extended tertian harmony in the second piece but having them be diatonic while using non-diatonic extended harmony in the third piece, such as the "♭III" in the Beatles song or turning the IV into a minor chord. Decisions like these happening to each version expose what specifics the listener liked/did not like, and when using these techniques correctly, the spectrum gets an even slope of more complexity throughout the 5 songs.

## Method 2: Surveying and Data Collection

The second method consists of gathering the quantitative data. This was done through a questionnaire and surveying process centered around the five pieces. The people surveyed listen to these versions and are asked questions that are related to the project. The questions include things such as asking them to rank the versions from their favourite to least, what about their first and last ranks they liked and disliked, and then other personality-related questions like their age, favourite genre, and if they listen to the radio. The purpose of this is to gather data on which demographic prefers which version to see if there are any similarities between the results, and with radio listeners consuming chart songs the most, seeing their opinion on complex songwriting is important for this research. The sample size for this survey should be big enough to give validity to any demographic consensus drawn from the information collected. When collecting empirical information, there are many ways to influence someone's answer and have biased data, so it is important to take measures to get the most accurate and honest answers for the survey, with the stimuli being music, it is a lot easier for the answers to get misconstrued. For this the people are surveyed individually so there's to be no peer bias when the data is being collected. Having friends/other people's reactions present while the listener is being surveyed distracts and deters the answers (Wiseman 105). The questions need to be straight to the point, so the answer addresses the topic directly. For example, one of the questions asks the listener to rank the 5 pieces from most to least preferred. It is important to word the question in an unbiased manner rather than wording it like "Do you think song 3 is better than song 2?", as that would make the listener think about those versions more than the 5 pieces overall. Once the quantitative data is collected, it's presented in a bar chart, pie chart, or any other data graph.

## Ethics

The ethical considerations form has been submitted and approved. There are no ethical considerations. There will not be a leading of the respondents within the survey.

## Conclusion

This methodology has been designed to address the topic of research directly and explain the rationale behind any of the decisions being made. Because things can change, this should be understood as a guide rather than a strict plan.

# Analysis

## Introduction

The analysis will look at the results of how the project was carried out via the methods described in the methodology. Any conclusions made for the project will come from the analysis of these results, but not discussed in this section.

## Composition of Songs

The project relies on the 5 pieces to act as stimuli for the survey, so analysing the songwriting for each of them is important as that's what the information that will be collected from the survey is based on. Each of the 5 pieces is named "Song 1" to "Song 5", 1 being the least to 5 being the most complex.

For Song 1 there is a clean-sounding drum kit playing a simple beat in 4/4, the harmony is a piano playing the common I-V-vi-IV progression with simple voice leading that does not jump, and the bass is playing root notes that are sometimes syncopated to give the piece more movement. Anytime it's not on the root it's playing the 5th of the chord. The melody is a plucky synth which is playing the pentatonic scale of G. Guitar is used to back up the harmony playing open chords, with a basic strumming pattern that switches to playing them on the 1 of every beat.

For Song 2, the drums have been chopped up to create a new rhythm in the same time signature and have a more saturated timbre. The harmony has now made use of extensions of the same chords, for example, G major tuned to Gmajor9, and some chords are starting a quarter beat behind the downbeat. In the third phrase, the harmony is slightly tweaked making use of Dominant 7 and diminished chords, which sound more dissonant. The bassline jumps around a lot more and uses more than just root notes but lands on them at the start of every chord. Melody is now playing all notes of the scale and is using rhythms with shorter subdivisions. Despite the use of more notes and more extensions between all instruments, all of them are still diatonic to the scale. The guitar is now replaced with a synth that plays the same notes as the piano, making the piano sound more like a pad, akin to electronic music.

Song 3's time signature switches to 5/4 which gives the piece an odd rhythm between all the instruments. The drums now turned synthetic with the kick being quantized to the grid and snare

playing behind it. The harmony is now playing chords outside of the key. such as the flat VIImajor7 and the minor iv. The progression also changes up every 4-bars, the second chord of each 2-bar phrase playing either a ii-V, a parallel 2nd up words, or a ♭VII, with the very last minor iv chord having an 11th extension. Synth is also slightly detuned to make the harmony sound more chorus and odd and is introduced in the second phrase to separate itself from the piano. The melody is mostly diatonic to keep the key of G established but will play the A# when the minor iv is played by the harmony. The bass is playing more sustained notes, which sink more to harmony and is playing non-root notes of the chords. When playing more subdivided notes it sometimes goes chromatic, ignoring the key signature.

In Song 4 the time signature has returned to 4/4 and the BPM has switched to 180 with swinging real drums. The hi-hat is playing on time with the click with the rest of the drums swinging around it, playing somewhat behind the beat, as well as the other instruments being played live, to give a loose sense of rhythm.

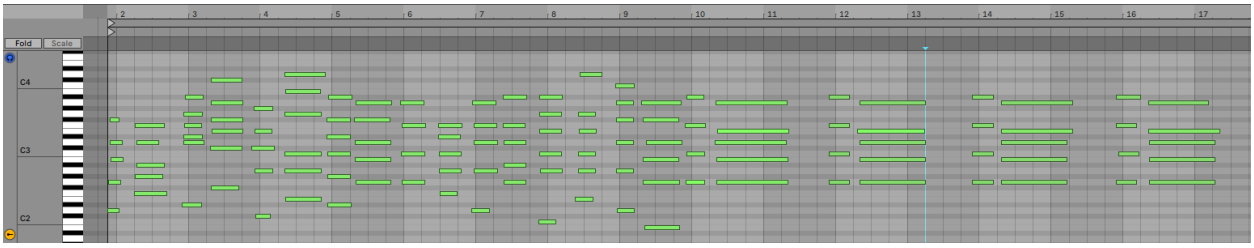



*Fig. 2: MIDI of harmony for "Song 4"*

The piano is backed with a slightly detuned pad that plays two chords per bar, in the rhythm of 3 and 5 half beats per bar, as seen in Figure 2. Briefly playing on the down beats in bar 6 and eventually switching back and forth between both. Harmony starts off playing V-I progressions that switch between different keys (much like in *Giant Steps*), then modulating between modes (e.g Amaj9 to Amin11), which sets up for a ii-V-I back to Gmaj9 but using tritone substitution on the V to resolve to the tonic. Immediately after that, it goes to a G quartal[3] chord to an F7 to D minor to Gminor7 to parallel voicing up two semi-tones to Amin♭9 (top note stays the same from Gmin7's top 3rd (B♭ note)), resolving the progression back to a ii-V-I to Gmaj9 again. For the

[3] Quartal Chord- a chord built up on the 4th of the previous note.

second half, the harmony stays on the G quartal chord to G6/9 progression as the melody plays over it. Melody follows a modal jazz playing style by playing different modes of G in every phrase: regular major, Lydian, harmonic minor, to minor. All in a different rhythm each time. Bass is doing a walking quarter note rhythm with the occasional 8th note fill. The bass's first part lands on the root/5th of every chord and between those landing notes play improvised passing notes. Halfway through the first half, the bass goes from legato to more staccato playing to emphasize the pulse of the piece. In the second half, it plays a C and G along with the piano consistently but then plays an assortment of 8th notes within G major, with occasional chromatic movement that matches the mode the melody is playing.

In Song 5 the bpm has returned to 103. The rhythm keeps a syncopated feel with the hats/shakers switching between triplets and quadruplets every beat, with the kick also operating on a triplet grid. The percussion timbre is also a bit more crushed and less clean than previous songs. There's also a switch from synthetic to real drums on the 3rd 8th note of every 2nd bar that lasts until the next bar. An occasional automated delay effect is placed on the drums to create quicker subdivision rhythms. The bass is driving the feel of the song, running up and down non-diatonically, adjusting the notes it runs through to whatever harmony is playing at that moment, having a much harsher distorted timbre.

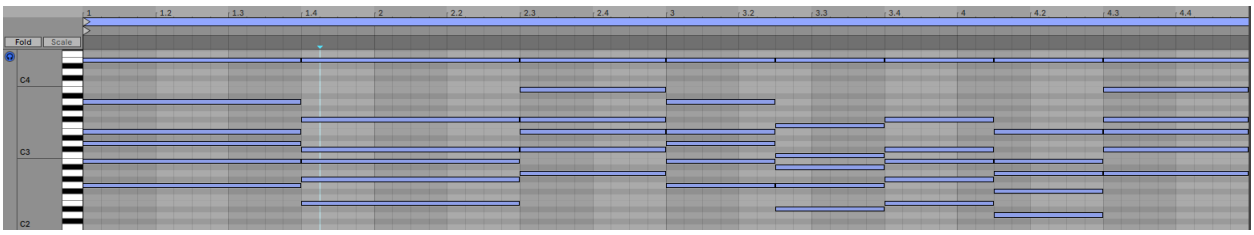



*Fig. 3: MIDI for the harmony of "Song 5"*

For the harmony, shown in Figure 3, the piano has now been completely removed with a harsher and more detuned synth pad. It uses parallel 6/9 chords jumping up and down to mimic a sampler being played rather than a keyboard. The harmony includes a consistent high E note to string the chords together (akin to Radiohead). Briefly switching to #11 major chords to keep it less predictable, it switches back to parallel 6/9 chords for the rest of the piece. The high e at the top of the harmony and melody makes it feel like e is the home which would make the key E minor,

the relative of G major. The melody makes use of polyrhythms like 4/6, 4/5, 4/3, and 8/5 cycling the same notes that are diatonic towards the original key to bring everything together, with a second detuned synth layered on top of the plucked synth.

## Survey Results

The survey found in **Appendix A** has 18 questions in total. The first part of the survey was to establish demographics based on age, genre preference, and whether they listen to the radio or not. This is to see if there are any common answers to draw from between them.

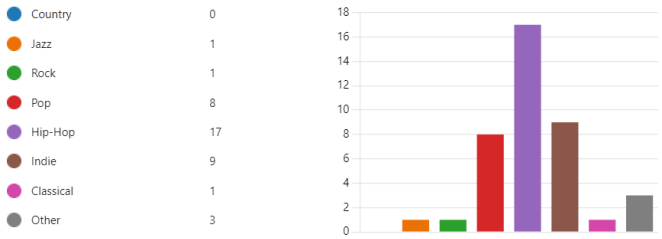



*Fig. 4: chart for "What music genre do you listen to the most?"*

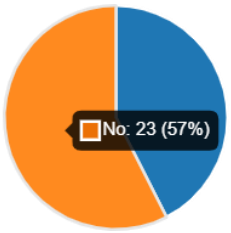



*Fig. 5: chart for "Do you often listen to the radio?"*

65% of the surveyed respondents are aged 25 and under, 42.5% listen to hip-hop the most and just over half of participants do not listen to the radio. 25% of the total participants share all these attributes, meaning the most accounted-for demographic is young hip-hop fans who do not listen to the radio. Any shared answers found between demographics will be brought up when relevant, but this survey is mainly about people's thoughts on the pieces.

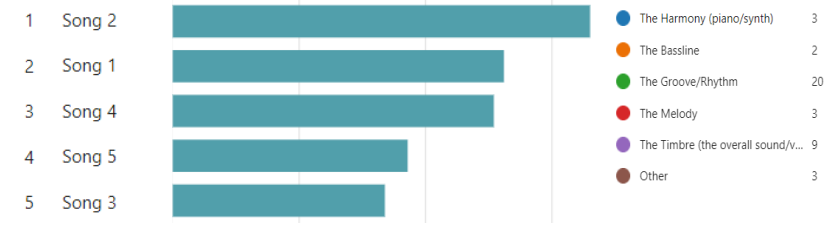



*Fig. 6: results for "Listen and rank the songs from most preferred to least preferred?"*

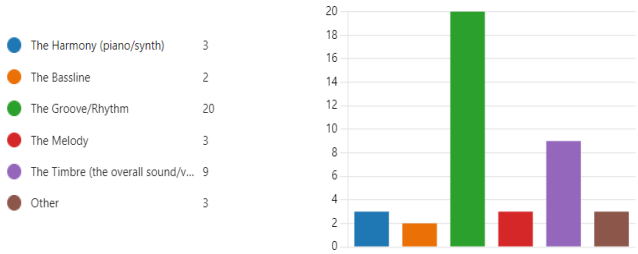



*Fig. 7: chart for "For the song you ranked as your favorite, what aspect of the song did you like the most?"*

Song 2 was the most preferred from the total rankings, with 48% of people ranking it as first and just one person ranking it fourth. Song 3 was the least preferred on average, with no one ranking it first and 66% ranking it fourth and fifth. Song 5 has 70% of participants ranking it fourth and fifth but 26% ranked it first and second. Song 4 and Song 1 are spread across the rankings

moderately, with Song 4 having the second-most first-place rankings and Song 1 having the most second-place rankings.

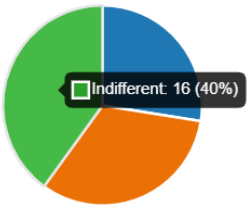
25% of participants listed the timbre as their favourite aspect of their favourite song and 50% listed the rhythm, with 80% of people who picked the rhythm listing Song 2 and 4 as their most preferred piece. Some specifics on why Song 2 was people's favourite include how it reminded them of their favourite genre and how the flow of the piece was more consistent. Most of them stated the melody and the harmony were the aspects they disliked the most, with a consistent critique of the melody being generic/boring and the harmony's sound being out of place.

Of those that chose Song 3 as their least preferred, all but two mentioned the reason being the drums sounding too off-beat (also a common answer for Song 5 being a least favourite), but just under half claimed the harmony of the piece was the aspect they enjoyed the most from it, with comments like "chords sounded cool" and "the harmony has potential".

There are three times as many participants who ranked Song 5 last as those who ranked it first. A frequent answer for those who ranked Song 5 last was the piece being too "chaotic" with too much happening, but those ranking it first mentioned they liked the atmosphere and how unpredictable it was.

People who ranked Song 4 first noted the feeling the piece gave them as the reason they ranked it first, using words like "jazzy", "groovy" and "fun" rather than musical specifics like the other participants. The only disliked aspect they expand upon is the melody which is described as "disjointed" and "too fast". This was a shared critique by those who ranked Song 4 last, but some of them also used words like "jazzy" to describe why they did not like it.

Most of those who ranked Song 1 first listed the timbre as their favourite aspect and described the song as "easy listening" and "upbeat". For the aspect they disliked the most, they shared similar comments with those who ranked the piece last, regardless of the aspect they chose, using words like "cheesy" when describing the harmony or "simple" for the melody.



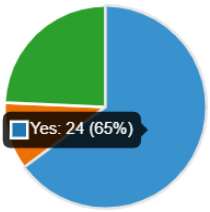




*Fig. 8: chart for "Are you as a listener satisfied with the music that is considered "pop" nowadays?"*

*Fig. 9: chart for "Do you prefer lyrics in the music you listen to?"*

40% of people are indifferent to how pop music sounds nowadays but gave responses to the 33% who are not satisfied with the genre. These elaborations are very similar to each other as they all feel that most pop music sounds the same and does not experiment. Some directions participants thought pop music should go include more instrumental-based songs, going back to the sounds of the 1980s and 2000s, and stopping social media-tailored songs. The final question has 65% of people preferring lyrics in their music, with 24% being indifferent and 11% preferring no lyrics in their songs.

## Conclusion

The songwriting for each piece has certain levels of complexity based on the techniques put into them which the participants of the survey have reacted to and inputted their opinions. There is not a demographic found in which all the members have shared the same answers, and the survey results show the order of the pieces based on average preference, with Song 2 ranking first and Song 3 ranking last. The results from both methods the project was carried out have been analysed and displayed for further discussion and interpretation.

# Discussion

## Significance of Findings

The results show what stuck out the most for participants when asked about the aspects of their preferred and least preferred pieces.

Rhythm is a big part of what makes a song enjoyable or not based on how many people chose that as either their liked or disliked aspect of whichever piece they liked or disliked. It seems with how Song 3 was favoured the least; audiences do not respond well to having a rhythm section where only one of the elements is noticeably syncopated. Based on the comments from those who picked the rhythm as their liked/disliked aspect, audiences can welcome complex rhythm when the drums have a uniform groove to them, like the collective swing from Song 4, rather than each element doing something different, like the different polyrhythms explored in Song 5. There's also a big emphasis on how people perceive melodies in music. Judging from the comments people had for Song 1, 2, and Song 4, people will reject simple melodies as predictable but still want something that makes sense to them and not something that sounds "disjointed". The same idea can be applied to harmony, with many stating Song 1's harmony as "cheesy" and some finding Song 5's harmony "all over the place". Based on these and comments about Song 3's harmony, a safe assumption can be drawn that jazz-influenced harmonic techniques can be welcomed with the correct timbre and rhythm with the rest of the instruments. For overall timbre, it seems on average people prefer a clean-sounding soundscape based on reasons given by those who picked Song 1 as their favourite, and Song 5 as their least. It seems timbre is quite impactful on someone's enjoyment based on the reactions to Song 4, meaning people will automatically dismiss or enjoy a song if it is dealing with a certain type of sound, regardless of songwriting. And with 89% of participants preferring or indifferent to having lyrics in songs, it is safe to assume most people prefer a less instrumental future for the genre of "pop".

## Comparison to Previous Studies

The result of rhythm being a large factor in a general listening audience's enjoyment of a song was something previously discussed in Richard Middleton's article, where he delved into how a lot of pop music's songwriting is cantered around the danceability of a song and having a consistent pulse in the tune for people to grab on to. Surveyed comments about Song 3 having a

“consistent” bassline and how Song 4 was “groovy” and made one participant “want to dance” are directly related to how Middleton talks about how important movement is in songwriting for popular music (Middleton 178).

Many of the rhythmic techniques in Song 3 and 4 took inspiration from Butterfield’s text about jazz and syncopation. One main takeaway from that article was that instruments that swing together with few elements staying on beat yield a better result than every element landing off beat (Butterfield). Seeing how the survey reacted to the rhythm of Song 3 and 4, that point was proven with the more positive reaction to drums swinging around the on-time hi-hat in Song 4 in comparison to the syncopated snare against the rest of the in-time instruments in Song 3.

Song 5’s timbre was quite divisive as it was most people’s reason for being ranked last based on preference but was others' reason for being their most preferred piece. This result is quite reflective of what was said in Shuker’s text about experimental songwriting limiting commercial potential but potentially creating a cult following (Shuker). This is also apparent in the survey elaborations as those who did not like the timbre did not provide answers more specific than “it wasn’t for me”, but those who did like the timbre detailed how it was “never too predictable” and how it created an “eerie atmosphere”. Details like these reflect the nature of the people who tend to enjoy more complex music, one of the takeaways in Shuker’s text.

The overall results from the survey relate to Early and Monson’s article about the way jazz still lives in modern times. With the texts’ point being pure jazz mostly living in the past and the most popular form of it currently being jazz fusion, the results from this research prove this by how audiences prefer complex attributes being put into a familiar sound rather than its pure form (Early, Monson). These results give more perspective to the path complex music might take to become relevant again.

## Limitations and Implications

One thing the project could have benefited from that the methodology could not carry out was exploring complexity in the length of certain music. Songs that end up on big radio stations can only go for so long before they get cut which means there are rarely commercial songs that are longer than four or five minutes. If there are they usually get cut down in what is called a “radio

edit", for example, Justin Timberlake's "Mirrors" being 8 minutes with the radio edit being 4 and a half minutes (Timberlake). This is a big contrast to more complex genres as a lot of the track lists on more well-known jazz and classical records have songs upwards of 9 minutes, such as the previously mentioned *Kind of Blue* (Davis).

There also could have been more variety in the demographics surveyed to get a reading on what certain demographics like and dislike. The 40 people who took the survey were not enough participants to draw any accurate conclusions about any of the demographics of listeners. This could have been made possible by having an even bigger general sample size or surveying in social circles that would contain a demographic one is trying to represent.

With a lack of vocals present in any of the pieces there is a lack of information about vocal complexity in this research outside of whether the participants enjoy lyrics in a song or not. Considering how big of an aspect vocals are in popular music, this information could have been useful as there could have been data about the audience's feelings about vocal timbres and whether certain styles sound good against the different pieces.

## Conclusion

When talking about what is too complex for popular music, the line is different for everyone, but it seems on average different attributes are more important than others. The results from this survey show rhythm and timbre are large factors in whether your average listener can like/dislike a song. Across all aspects and techniques, the average listener will welcome complexity over music that sounds basic, if it is uniformed with the rest of the elements in a piece and not disjointed. Many listeners also believe that what is considered popular music today sounds very similar.

# Conclusion

## Summary of Findings

The objective of this project was to create a spectrum of pieces that incorporate elements of songwriting from complex genres with every piece and to record people's reactions to this spectrum of songs to get a view of how the average listener perceives these musical ideas.

The main findings from the survey are Song 2 being the most well-received piece and Song 3 being the least well-received. 50% of participants chose the groove/rhythm as their favourite aspect of their preferred piece, with 80% of those picking Song 2 and 4. The rhythm was also the most picked aspect for people's least favourite of the piece they ranked last, with all but 2 who picked Song 3 mentioning the rhythm as why. Just under half of these participants listed the harmony as their preferred aspect of the piece. The timbre was the second most picked aspect in this vein, with Song 5 having the most complaints about sounding too "chaotic". The melodies for Song 2 and 4 were the most rejected aspect for either piece. Most of the enjoyment for Song 1 came from being "easy to listen to", but a common comment was that it sounded too "cheesy". 40% of people are indifferent to how pop music sounds but most joined the 33% who are not satisfied with pop music in giving their thoughts on the state of the genre and where they think it should go, with a common opinion of thinking most pop music sounds similar. 65% of participants prefer their music with lyrics in them, with 11% preferring no lyrics and 24% being indifferent. No accumulative answers are coming from any of the demographics established by the survey.

## Implication of Findings

Based on the findings, it can be concluded that aspects from complex genres can be incorporated into popular music if the techniques can mix well with the rest of the elements in the piece. Things such as melodies are can be unpredictable but not disjointed, rhythm can be syncopated but still contain a consistent groove for the listener and harmony can be experimental if paired with a timbre that is not too abrasive. Listeners are open to a change in the songwriting of today's popular music if the change is not drastic.

## Limitations and Future Research

The method of research conducted does not allow the length to be analysed in the context of musical complexity, which is something a lot of complex genres explore in their music. Having

the research carried out differently could have covered all aspects of songwriting as opposed to the ones picked.

With a sample size of 40 people, it limited the potential data that could have been gathered with this research topic. Having a larger sample size, more groups of listeners could have been represented in the data and potentially revealed patterns of answers between the demographics established, which would be recommended for future research on this topic.

With how big vocals are in popular music, there is a lack of data covering the average listener's thoughts on different vocal types and timbres against the five pieces or in general. If included the project would have befitted from the information.

## Conclusions

Across genres, listening habits, and ages, people have preferences in the way they think popular music should sound and see faults with the current state of pop music. Music genres with complex songwriting contain aspects that average listeners enjoy and would like to see become more popular, as long as they're implemented in a way that is not abrasive and can mix well with the other elements in songs they are put in. Complex genres have a chance at becoming popular again through the use of their songwriting in more popular music.

## Recommendations

Recommendations for future research include using a bigger sample size as it can acquire more data for more demographics, including research about vocal timbre and vocals in general as they are a large part of popular music and include research about song length as a lot of complex music experiments with length more than popular music

# Bibliography

"I analyzed the chords of 1300 popular songs for patterns. This is what I found." HookTheory, 6th June 2012 https://www.hooktheory.com/blog/music-theory-analysis-1300-songs-for-songwriting-part2/, Accessed 22 October 2023

Blacking, John. "Some notes on a theory of African rhythm advanced by Erich von Hornbostel." African Music: Journal of the International Library of African Music 1.2 (1955): 12-20.

Boothroyd, Myles. "Modal Jazz and Miles Davis: George Russell's influence and the melodic inspiration behind modal Jazz." Nota Bene: Canadian Undergraduate Journal of Musicology 3.1 (2010).

Butterfield, Matthew W. "Race and rhythm: The social component of the swing groove." Jazz perspectives 4.3 (2010): 301-335.

Carlton, Dave. "*Part 2: I analyzed the chords of 1300 popular songs for patterns. This is what I found."* 27 June 2012. 22 October 2023.

Collaros, Pandel. “The Music of the Beatles in Undergraduate Music Theory Instruction.” Indiana Theory Review, vol. 21, 2000, pp. 53–78. JSTOR, http://www.jstor.org/stable/24046484. Accessed 28 Nov. 2023.

Davis, Miles, *Kind of Blue,* Sony Music, 1959, *Spotify* App

Early, Gerald, and Ingrid Monson. "Why jazz still matters." Daedalus 148.2 (2019): 5-12.

Hope, Rachel, "Underground Music Genres: From the Fringes to the Mainstream" Sound Of Life, 19 October 2022, https://www.soundoflife.com/blogs/mixtape/underground-music-genres. Accessed 11 December 2023.

Letts, Marianne Tatom. "Radiohead and the Resistant Concept Album: How to disappear completely". Indiana University Press, 2010.

Middleton, Richard. “Popular Music Analysis and Musicology: Bridging the Gap.” Popular Music, vol. 12, no. 2, 1993, pp. 177–90. JSTOR, http://www.jstor.org/stable/931297. Accessed 13 Nov. 2023.

Sherburne, Philip, "25 Microgrenres That (Briefly) Defined the Last 25 Years" Pitchfork, 7 October 2021 https://pitchfork.com/features/lists-and-guides/microgenres-25th-anniversary/. Accessed 11 December 2023

Shuker, Roy. Popular Music Culture: The Key Concepts. Routledge, 2012. Accessed 13 November 2023

Timberlake, Justin. "Mirrors", *The 20/20 Experience (Deluxe Version),* RCA Records, 2013, *Spotify* App

Trust, Gary, "Country & Pop Remain Tied on Top: The State of the Hot 100’s Top 10 Through Q3 2023", Billboard, 28/11/23, https://www.billboard.com/pro/country-pop-top-genres-hot-100-top-10-q3-2023/ ,Accessed 28.11.23

Waters, Keith. “‘Giant Steps’ and the Ic4 Legacy.” Intégral, vol. 24, 2010, pp. 135–62. JSTOR, http://www.jstor.org/stable/41495297. Accessed 7 Apr. 2024.

Wiseman, Frederick. "Methodological bias in public opinion surveys." The Public Opinion Quarterly 36.1 (1972): 105-108.

# Appendices

**Appendix A-** https://forms.office.com/e/jKtTweeNj7