

投稿類別：
英文寫作

篇名：
An Introduction to the violin and the Mozart Effect

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I. Introduction

I.1. Motivation

Being a violin learner, I always believe violins can considerably influence people's emotions and feelings. I have learned playing the violin since I was a first grade student. To me, playing the violin serves not only as a hobby but also one of the best ways to relieve my stress from high school exams. Moreover, I am curious about the history of the violin and the reason why I feel peaceful, energetic or relaxed when some songs are played. My curiosity motivated me to explore the so-called "Mozart Effect," which claims that listening to the Mozart's songs will develop and improve children's brain and intelligence. However, a lot of research also propose the Mozart effect doesn't exist. With doubts in my mind, I decide to do a survey of the Mozart Effect.

I.2. Propose

This essay will focus on two purposes, the history of the violin and is the mental reactions aroused by Mozart's violin works. The first part of my essay will briefly talk about the history of the violin in Europe and Taiwan, and an analysis of the questionnaire on Mozart's works will be shown in the second part.

I.3. Method

In this essay, document analysis method will be adopted for the history of the violin. On the other hand, written questionnaires are used to survey the people's feelings when they listen to the Mozart's songs.

II. Thesis

II.1 A brief introduction to the violin and the important violin musicians

II.1.1 The introduction to the Violin

The violin, also called fiddle (most people called it fiddle when it comes to folk music), is a kind of the string instruments that shows the highest-pitched in the "Violin member," which includes the viola and the cello. Violin consists of a body, a neck, a bridge, a soundpost and four different strings. There are various factors that may affect the sound and the style of the violin. For example, strings of different materials will affect the sound emitted by the violin.

To play the violin, violinists need to put it on one side of their shoulders, with one hand plucking the strings or pulling the bow across one or more strings to perform signal melody or harmony, and

another pressing the chords to produce different sound. The violin can be performed in a wide variety of styles, such as, Baroque music, classical, jazz, folk music, rock and roll, and soft rock.

II.1.2. The important violin musicians

II.1.2.1 Antonio Vivaldi

Antonio Vivaldi, also referred to as IL prete rosso, was born in Venice and died in Vienna. In his lifetime, he composed considerable instrumental concertos. One of his violin concertos, *The Four Seasons*, is known to all over the world. *The Four Seasons*, was composed in four tunes, *Spring*, *Summer*, *Autumn*, and *Winter*, each of which conveys different emotions to listeners.

II.1.2.2 Mozart Wolfgang Amadeus

Mozart Wolfgang Amadeus, a musical prodigy, was born in a prominent musical family in Salzburg, Austria in the Classical period. In his life, he developed many kinds of sonatas, symphonies, masses, concertos and operas. Mozart's string quartets have enjoyed worldwide popularity even till today. One of his famous string creations, *Serenade für Streicher in G-Dur*, is full of dignified, harmonious and delicate beauty.

II.1.2.3 Paganini Nicolo

Paganini Nicolo, born in Genoa, Italy, was taught music by his father, Antonio Paganini. Although Paganini was regarded as a gambler when he was old, he still successfully created variety sonatas, concertos, and quartets.

II.2 The change of the violin: redec, crwth, vielle & lira de braccio

II.2.1. The redec

The redec, also called lira, developed in the 9th century and was a typical bowed instrument of the Byzantines. The redec was made by only one piece of wood, composed of one to five strings, and most of the redec were made with three. During the Renaissance period, the redec has a great influence on the development of the violin and the viola.

II.2.2. The crwth

The crwth (George Pollen · 2010) is a kind of string instruments, made with only one piece of wood in the Middle Ages. This instrument died in the 18th century because of the appearance of the string family. Nowadays, only few people play the crwth. The difference between the crwth and the violin is that the crwth has six strings, with two "mi" strings, two "la" strings, and two "ti" strings, while the violin has only four strings, sol-re-la-mi. Another difference is that the bridge of the crwth is

much flatter than the violin's so with the crwth people can easily play the hale six strings at once to create the consonance.

II.2.3. The vielle and the lira de braccio

The vielle, the most common string instrument in the Middle Ages, was carved out of one piece of wood and was composed of five strings. The vielle also played a part in the development of the violin and the lira de braccio.

The lira de braccio, originated from the vielle, was born in the Renaissance period. It has a lot of features similar to those of the vielle(Kate Buehler, 2008). The lira de braccio had been drawn in the paintings in the Middle Ages, but little information of the lira de braccio can be found

II.3.The distinguishing feature and the influence of the violin in Baroque, Classical, and Romantic period

II.3.1.The distinct features of violin in Baroque, Classical, and Romantic period

II.3.1.1 Baroque period

During early Baroque period (Wu, Hong-I, 2011), many excellent violinists and composers still known to people nowadays were active. There were also some violin makers were very important in this period. About the form of the violin, it has had been developed in the form we see now since approximately 1930, and it have been made by sol-re-la-mi four different strings since 1556.

During 17th century, violin mostly performed to accompany human voice and dancing in Italy, and it has become more important since then. During mid-18th century, violinists imitated their professors' playing skills.

II.3.1.2. Classical period

During Classical period(Wu, Hong-I · 2011), there were more and more classical music concerts had been hold in Europe (Vienna which is in Austria had been the music capital in Classical period.), and the performing of the violin had created into solos, sonatas, concertos, and orchestras, which could create the important violinists such as Haydn, and Mozart was performed nowadays.

II.3.1.3. Romantic period

During Romantic period(Wu, Hong-I· 2011), violin music style had focused on human emotions that had more works and the many musicians moved into Paris in France after the French Revolution.

The second half of the 18th century, the teaching style of violin had been changed, and many books were published, such as Geminiani's *The Art of Violin Playing*, Leopold Mozart's *Vilinschule: Fundamental principles of violin playing*, and L'Abbe le fils' *principes du violon* for learners to study because of the improving typography.

II.4 The discussion between Mozart's songs and the emotional expressions

II.4.1 A research about "The Mozart effect"

According to the research written by Rauscher, Shaw, and Ky (1993) on the Nature magazine, the scientists proved that the Mozart effect does exist. The subject students in the experiment was divided into three groups, one of them is to listen to ten minutes two Mozart D minor sonata songs, another spent instructing to lower their blood pressure for ten minutes in the relaxation condition, and the other spent ten minutes sitting in the silence condition. After ten minutes, the three groups of students were tested with Stanford-Binet intelligent scale. As a result, the first group, listening to two Mozart songs, got the higher scores. So, they believed the Mozart effect does exist.

II.4.2 The opposite viewpoint about the research

Steele, Ball and Runk (1997) examined whether the Mozart effect does exist and presented the conclusion "No significant differences among treatment conditions were found". They designed that 36 undergraduates exposed to 10-min. periods of Mozart music, a recording of rain, or silence. After 10 minutes, undergraduates had three attempts to hear and recall different 9-digit strings in reverse order, but the result was different from the previous research. So, they thought the Mozart doesn't exist.

II. 4.3 Can people precisely understand Mozart's songs styles?

Although the research reported the Mozart effect may not exist, we can't ignore Mozart's songs influence people a lot. Thus, this essay designs a questionnaire to test whether the styles of Mozart's violin songs can be distinguished. In this essay, the questionnaire contains six questions, and each of the questions has three choices to express the subjects' feelings.

II. 4.3.1 How to choose the subject

150 questionnaires were sent out to investigate, and 124 questionnaires were taken back, so the return rate is 0.8267. Therefore, The subject contains 124 people, and they are randomly chosen from 10th grade in Dayuan International High school, 9th grade in Wun Chang Junior High School, and their parents. However, 17 of the questionnaires were be taken away because all of the answers in their questionnaire are chosen the same. Finally, there are 107 adopted questionnaires.

II 4.3.2 How to decide Mozart's songs

According to the disk jockey Xing,Zi-Jing (2010) in Philharmonic Radio Taipei Co., Ltd., she collected the Mozart's songs from the experiment of Mozart effect and defined the different styles on the songs. Thus, the researcher chose all of the songs played by violin from the song collected by Xing. The following are the six songs in this questionnaire.

- (1) Mozart - Eine Kleine Nachtmusik, K 525 played Allegro, which can help adult enhance energy
- (2) Mozart-Violin Concerto No. 2 in D Major, K. 211 III. played by Allegro, which can help adult feel relax
- (3) Wolfgang Amadeus Mozart - Haffner Serenade in D major KV 250 - III. played by Menuetto, which can help adult sleep
- (4) Wolfgang Amadeus Mozart - Symphony No.40 in G Minor K.550 - (3) played by Menuetto, which can help adult enhance energy
- (5) Violin Sonata K.378_ played by Andantino, which can help adult sleep
- (6) Mozart Violin Concerto No. 1 in B-flat Major K. 207 - 3rd Movement played by Presto, which can help adult feel relax

II 4.3.3 What the factors are in the questionnaire

Gender, age, and whether to have learned music are the three factors in the questionnaire, and the subject finally contains 124 people, and there are 107 adopted questionnaires and 17 un-adopted questionnaires, including 32 male, 75 female, 60 have learned professional music lessons, 47 haven't just learned music class at school, and the age ranges, divided into three parts, under 15, from 16 to 18, and above 19, are respectively 27, 70, 10.

The adoption of the questionnaires(E-1)

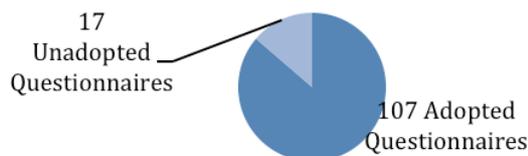


Chart 1 the adoption of the question

II. 4.3.2 The description about the song style of enhancing energy

The first and the fourth songs present the atmospheres about enhancing energy. The first song is Mozart - Eine Kleine Nachtmusik, K 525 played Allegro and the fourth one is Wolfgang Amadeus Mozart - Symphony No.40 in G Minor K.550 - (3) played by Menuetto. In this investigate, 76% of the subject can feel the first enhancing energy, and 24% of the subject chooses other answers, feeling sleep and relaxation. 60% of the subject feel the fourth enhancing energy, and 40% feel sleep and relaxation.

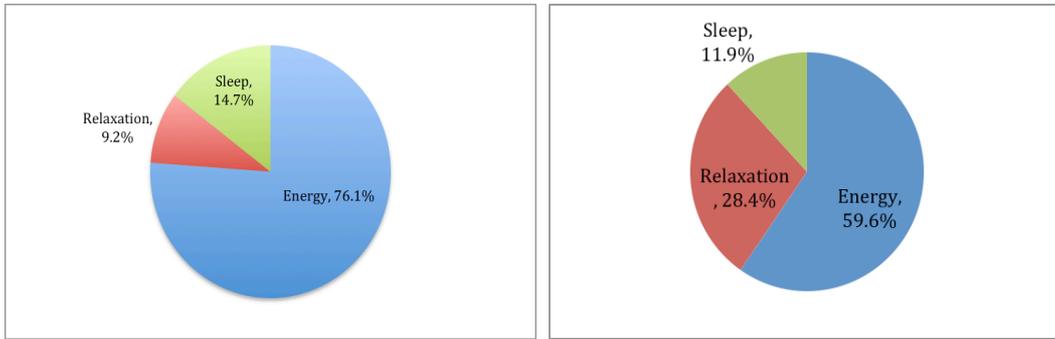


Chart 2 the song style of enhancing energy

II. 4.3.3 The description about the song style of relaxation

The second and sixth songs emphasis on relaxation. The second one is Mozart-Violin Concerto No. 2 in D Major, K. 211 III. played by Allegro, and the sixth one is Mozart Violin Concerto No. 1 in B-flat Major K. 207 - 3rd Movement played by Presto. The result of the second one shows 37% choose relaxation, 38% chooses sleep, and 25% chooses energy. The sixth one shows 36% chooses relaxation, 48% chooses energy and 16% chooses sleep.

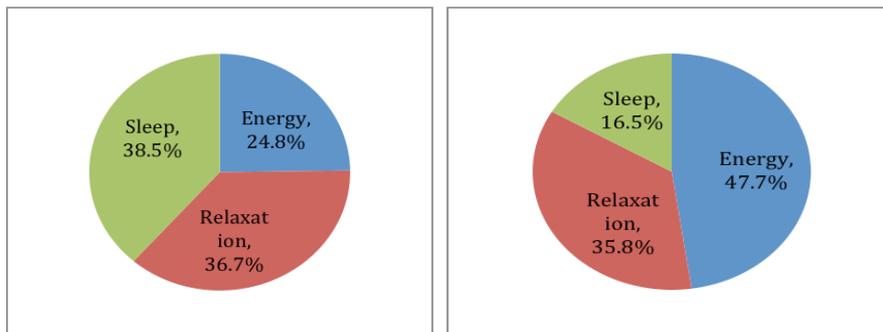


Chart 3 the song style of relaxation

II. 4.3.4 The description about the song style of Sleep

The third and fifth songs emphasis on sleep. The third one is Wolfgang Amadeus Mozart - Haffner Serenade in D major KV 250 - III. played by Menuetto, and the fifth one is Violin Sonata K.378_ played by Andantino. The result of the second one shows 54% choose sleep, 33% chooses relaxation, and 13% chooses energy. The fifth one shows 79% chooses sleep, 16% chooses relaxation, and 5% chooses energy.

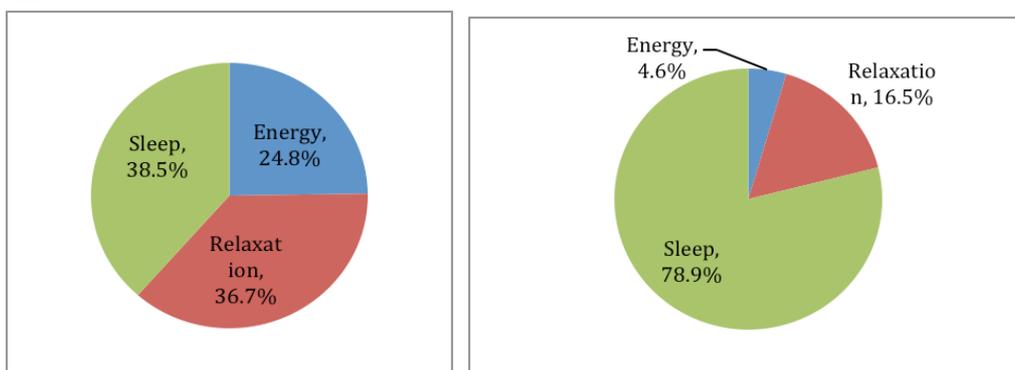


Chart 4 the song style of Sleep

II. 4.3.5 The description between gender and the song style

The following chart indicates the relationship between the subjects' gender and the song style which they chose, and different genders don't have difference because the trend of the gender is similar.

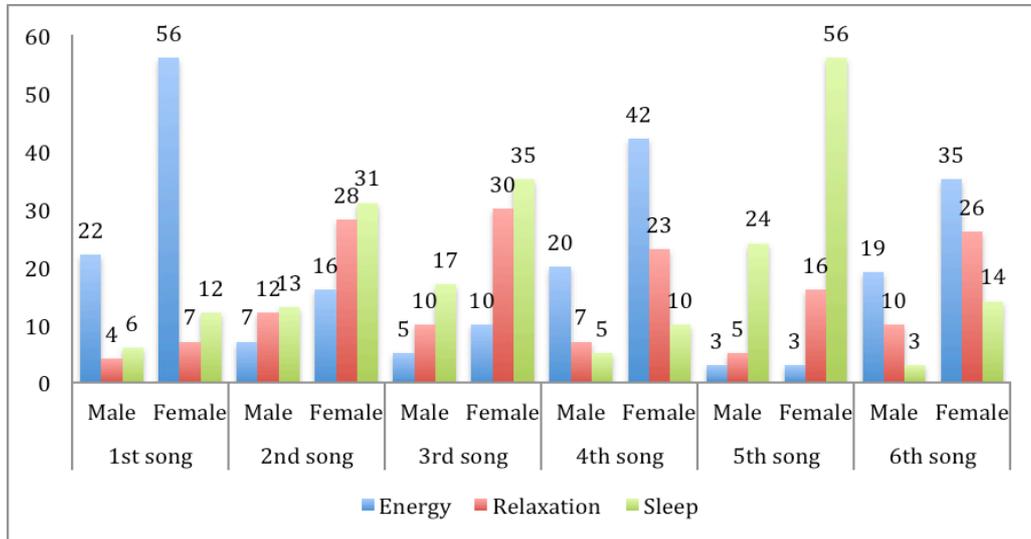


Chart 5 the result between gender and the song style

II. 4.3.5 The description between having music background and the song style

In the following chart, the relationship between the subjects' background and the song style is shown, which indicates different backgrounds have similar choices except for the second song. However, the same number of subjects who have learned music chose the second song as relaxation and sleep.

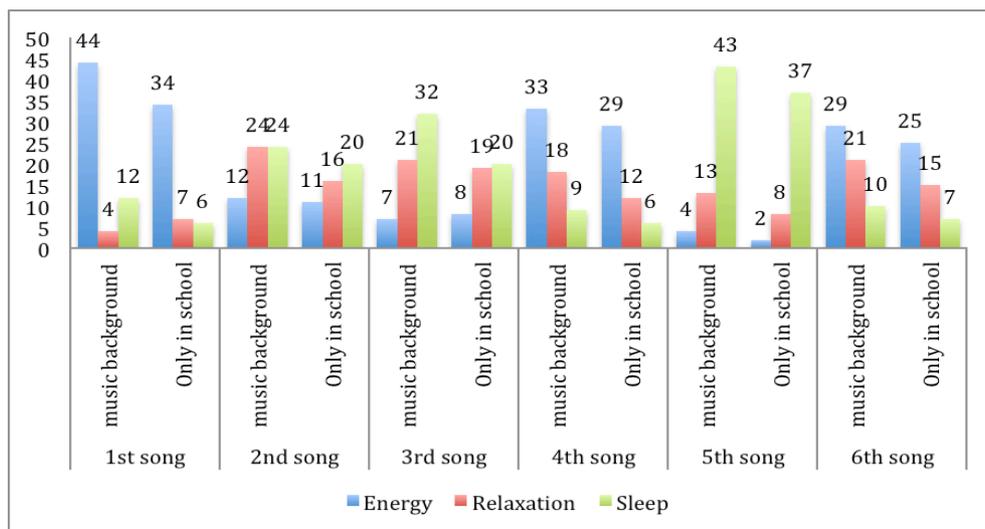


Chart 6 the result between having music background and the song style

II. 4.3.6 The description between age and the song style

The following chart shows the relationship between age and the song style the subjects chose. The data shows there are no difference in the trend of the first, the fourth, the fifth, and the sixth song, but the subjects with different age have distinguish difference in the second and the third song.

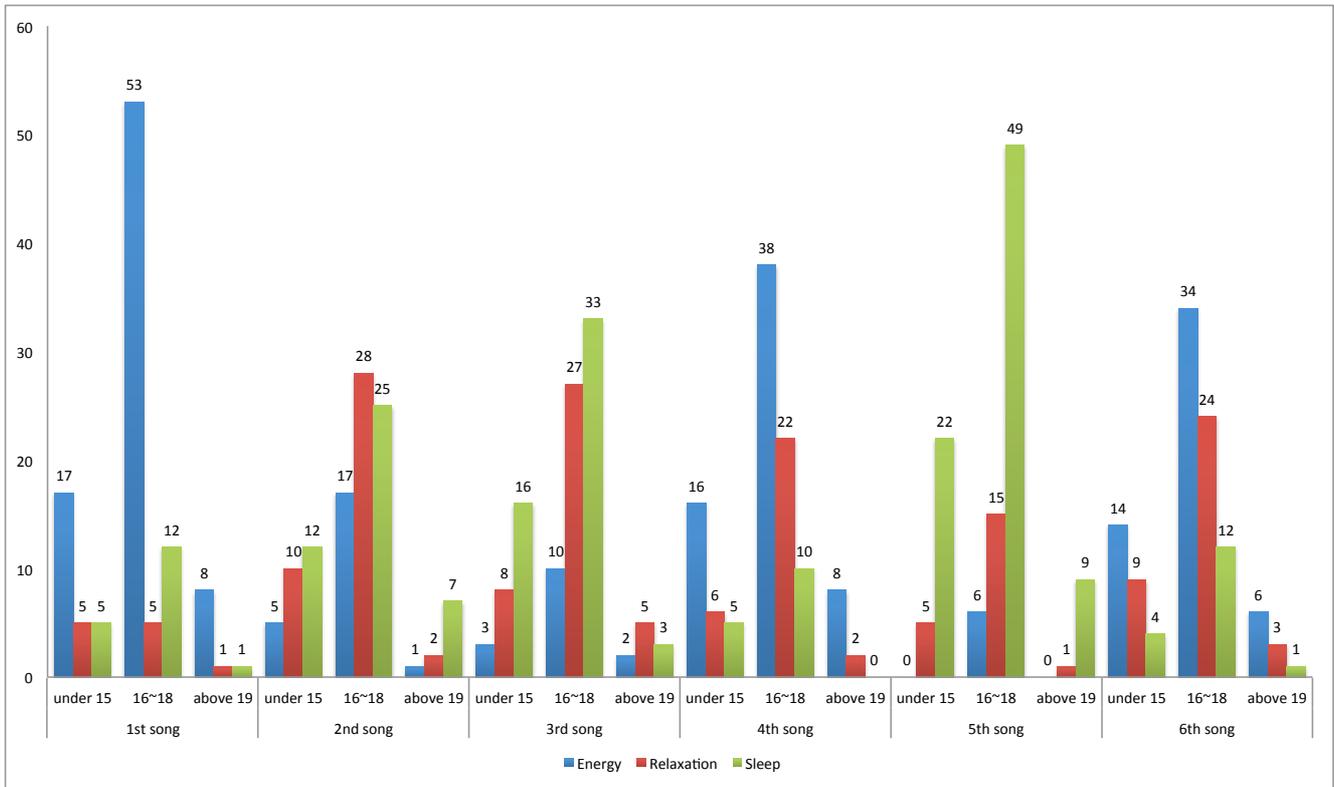


Chart 7 the result between age and the song style

III Conclusion

The result of the second, the third and the sixth songs are different from the style of Xing’s definition from Mozart’s effect research. In addition, the sampling method doesn’t consider the classification of the subject, which results from that the quantities of each group is not enough while sampling. Moreover, the questionnaire was investigated with paper, so the procedure of taking back makes mistakes easily, which makes the researcher need to rewrite many time. By the way, the paper method also limits the region and time on investigating.

Therefore, the method of investigating needs to be revised. First, to inquire the professionals like music teacher before selecting songs is needed. Second, pretesting in a small region should be done in case for the confusion of the definition of style. Third, the web questionnaire like Survey GIZMO may be used next time.

IV reference

IV.1. Books

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String instrument-Violin 問卷

Hallo！各位同學： 謝謝大家幫忙填寫問卷！

這份問卷是以『莫札特效應』(Mozart Effect)為主題來探討各位對於音樂的感受是否與學者所說的感受相符。本問卷僅作為綜合分析，不涉及個別探討，希望大家以自身感受確實作答。

本問卷共分為「基本資料」與「莫札特效應之音樂感受」兩部分，請大家仔細閱讀各部分的填答說明後逐項填寫。Thank you and have a nice day~~~

研究者：大園高中一年級林家琦

填答說明：

- 一、本問卷分為兩大部分，第一部份為「基本資料」、第二部分為「莫札特效應之音樂感受」。
- 二、請依個人感受，在每一題目之適當的內擇一打[~]或提供修正意見，俾利平日後問卷修正之參考，

第一部份：基本資料

(請在下列您的個人資料欄內是當的「」內標註「[~]」符號。)

- 一、性別：女 男
- 二、年齡：十三至十五歲 十六歲至十八歲 十九歲以上
- 三、音樂學習程度：
只有學校音樂課 有在外或自行學習音樂的相關知識(樂器、樂理...)

第二部份：莫札特效應之小提琴音樂感受(聽完小提琴演奏後，請依照個人感受，在適當的敘述「」中打「[~]」)

本部分只在了解您對於各個小提琴曲目之看法，問卷內容依據文獻探討歸納出三個感受：增加工作動力、感到舒壓調和與覺得放鬆休憩。總計6題，分別是

- 曲目一：Mozart - Eine Kleine Nachtmusik, K. 525
曲目二：Mozart-Violin Concerto No. 2 in D Major, K. 211 III.
曲目三：Wolfgang Amadeus Mozart - Haffner Serenade in D major KV 250 - III.
曲目四：Wolfgang Amadeus Mozart - Symphony No.40 in G Minor K.550 - (3)
曲目五：Violin Sonata K.378
曲目六：Mozart Violin Concerto No. 1 in B-flat Major K. 207 - 3rd

- 一、請聽完曲目一之後勾選自身感覺： 增加工作動力 感到舒壓調和 覺得放鬆休憩
- 二、請聽完曲目二之後勾選自身感覺： 增加工作動力 感到舒壓調和 覺得放鬆休憩
- 三、請聽完曲目三之後勾選自身感覺： 增加工作動力 感到舒壓調和 覺得放鬆休憩
- 四、請聽完曲目四之後勾選自身感覺： 增加工作動力 感到舒壓調和 覺得放鬆休憩
- 五、請聽完曲目五之後勾選自身感覺： 增加工作動力 感到舒壓調和 覺得放鬆休憩
- 六、請聽完曲目六之後勾選自身感覺： 增加工作動力 感到舒壓調和 覺得放鬆休憩