# On a Blue Note: Depressed Peoples' Reasons for Listening to Music

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#### **Abstract**

Research suggests that negative moods may be associated with attraction to negative emotion in music, a finding that runs counter to mood management theory. Despite such evidence, no study has examined how and why people who have clinical depression listen to music. Qualitative thematic analysis was conducted with textual responses from 294 online survey respondents (148 with depression and 146 without depression). Findings revealed that people with depression were more likely to use music to match or reflect mood or to express emotion, while those without depression were more likely to use music for energy and inspiration. Negative emotion in music enabled some to attend to negative emotion, with subsequent dissipation of negative mood. For others, it was connected with negative cognition and a worsening of negative mood.

## **Keywords**

depression, emotion, music, negative mood

# **Music and Mood Management**

Music is an important part of human experience and is widely recognized for its capability to alter mood. Huron's review<sup>1(p60)</sup> of evidence of music as an evolutionary adaptation concludes that music is "a ubiquitous presence in human lives" and that there is evidence for use of music for mood regulation and social bonding going back thousands of years. Hargreaves and North<sup>2(p73)</sup> discuss "the power of music to act as a vehicle for feelings which may not be possible to convey by other means." Juslin and Laukka<sup>3(p232)</sup> conclude that people listen to music "because of the valued emotional experiences it offers. Music is used to enhance or change emotions (to relax, to arouse, to comfort) or to evoke emotional memories."

Research consistently reports mood management and emotional expression as being the most important reasons for listening to music. 4-11 Mood management theory is based on the premise that individuals seek to experience the highest degree of pleasure attainable 12,13 and predicts that people will select media that is semantically dissimilar and opposite to negative mood states, from an excitation standpoint, and furthermore has positive hedonic value above that of positive mood states. Some studies have supported this premise. For example, Knobloch and Zillmann's standy of undergraduate students found that respondents in negative moods preferred exposure to highly energetic, joyful music over music low in these qualities, compared to respondents in positive moods.

Other studies have not supported this premise: Dillman Carpentier et al<sup>15</sup> found that adolescents who consumed "fun media" did so in order to sustain rather than enhance a positive mood, while adolescents in negative moods did not display a tendency to use media to improve their negative moods. Similarly, Knobloch and Zillmann<sup>16</sup> reported a preference for lovelamenting over love-celebrating music among romantically dissatisfied young adults.

The current study aimed to examine the effect of depression on reasons for listening to music by comparing reasons given by people who were currently depressed with those who reported no depression history (current or past). In referencing the terms *depression* and *mood*, the definitions are those provided by previous research and the authors' previous work. <sup>17,18</sup>

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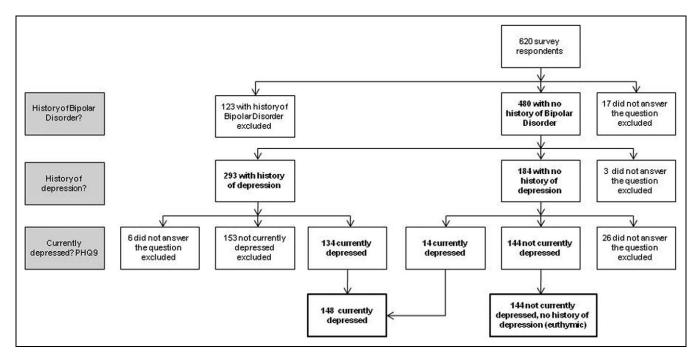


Figure 1. Recruitment flowchart.

## Music Use in the Context of Depressed Mood

In a recent report of a qualitative study of responses to sad music. Garrido and Schubert<sup>19</sup> suggested several patterns of music choice. Some individuals preferred uplifting music and avoided sad music. However, others chose to listen to sad music for a variety of reasons, including (1) to elicit strong arousal emotion that was both congruent and opposite to their current mood state; (2) to enjoy the "psychological benefits of catharsis, emotional connection or emotional resolution without the usual attendant pain and displeasure", 19(p225); or (3) to enjoy the experience of sad music and to enable grief, elicit memories, or simply disengage from negative stimuli. Participants differentiated between adaptive outcomes (that lead to enjoyment of their mood state or resolution of mood state) and maladaptive outcomes (that lead to the listener being trapped in a ruminative state or negative mood). However, these participants were selected because they had a strong emotional response to music rather than because they had a prevailing negative mood.

Garrido<sup>20</sup> suggested that there is little written about why people choose to listen to sad music because there is an assumption, based on the mood management theory, <sup>12,13</sup> that people listen to music to maintain or improve their mood. Garrido's review <sup>20(p22)</sup> concluded that "habitual ruminators and those suffering from clinical or undiagnosed depression appear to have an involuntary bias towards negative stimuli and therefore provide an exception to mood management theory." It was noted that Rentfrow and Gosling<sup>21</sup> had reported that people with depression often chose music that maintained their depressive state; however, this study had not considered rumination as a possible contributor. Chen, Zhou, and Bryant<sup>22</sup> reported that

participants who were inducted into a negative mood via a sad television clip spent significantly less time listening to joyful songs afterward than did those in a neutral mood condition.

Research into the reasons for listening to music has traditionally utilized the "uses and gratifications" approach, <sup>23</sup> in which respondents describe their motivations for listening to music in an open-ended format. This approach was utilized in the current study whereby participants were asked to provide written responses to an open-ended question describing their reasons for listening to music. This approach is based on a number of assumptions: first, that use of media is goal directed and reflective of the expression of psychological need, as opposed to chance circumstance where individuals are passive recipients and, second, that recipients are sufficiently self-aware to report their interests and motives.

Through surveying a sample of people with depression, the current study aimed to provide further insight into why people in negative moods seem to be attracted to emotion in music.

## **Methods**

Participants (N=620) were recruited via the Black Dog Institute website (blackdoginstitute.org.au) between March and November 2009. People who accessed the website were invited to complete an online survey. Initial inclusion criteria were age over 18 years and the ability to read and write in English. The recruitment process is shown in Figure 1.

All participants were first asked to indicate (yes or no) whether they had ever received a diagnosis of depression or bipolar disorder from a general practitioner or psychiatrist. Current depression was then measured using the Patient Health Questionnaire-9 (PHQ-9),<sup>24</sup> a subsection of the PHQ, which

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**Table 1.** Participant Characteristics for Depressed and Control Groups.

	Depressed (n = 148) n (%)	Control (n = 144) n (%)
Male	45 (30.4%)	47 (32.6%)
Female	103 (69.6%)	97 (67.4%)
Age		
18-25	41 (27.7%)	56 (38.9%)
26-35	42 (28.4%)	41 (28.5%)
36-45	32 (21.6%)	25 (17.4%)
46-65	32 (21.6%)	18 (15.3%)
66+	I (0.7%)	=
PHQ-9 mean (SD) score	19.7 (3.4)	5.3 (3.8)

Abbreviation: PHQ-9, Patient Health Questionnaire-9.

establishes depressive disorders based on 9 items corresponding to *Diagnostic and Statistical Manual of Mental Disorders* (Fourth Edition [*DSM-IV*]) diagnostic criteria. The PHQ-9 has established criterion, construct and external validity, high internal reliability (Cronbach  $\alpha = .89$ ), and a test–retest reliability coefficient of .84.<sup>25</sup>

A depressed group (n = 148) and a nondepressed (control) group (n = 144) were drawn from the sample. Group allocation occurred according to 3 criteria: (1) currently depressed (yes or no); (2) history of depression (yes or no); (3) history of bipolar disorder (yes or no). Those with a history of bipolar disorder were excluded from both groups, given that the focus of the study was on the effect of depression on reasons for listening to music, whereas the experience of mania would be considered to have a different effect. The group with depression included those who were currently depressed, whether or not they had a history of depression. The nondepressed (control group) included those who were *not* currently depressed and *did not* have a history of depression. Participant characteristics (sex, age, and mean PHQ-9 score) are shown in Table 1.

## **Analysis and Results**

The study utilized mixed methods analysis. Thematic analysis of textual responses was carried out with QSR NVivo qualitative analysis software, version 9. "Thematic analysis" is defined by Braun and Clarke<sup>26(p79)</sup> as "a method for identifying, analyzing, and reporting patterns (themes) within the data." The aim was to identify themes within the data and to compare the prevalence of each theme between depressed and nondepressed individuals. An inductive approach was used, with no preconceptions about the reasons why people listen to music. Data were coded in a constant comparison process. That is, textual responses were first read and coded to identify commonly cited reasons for listening to music. When a new code was identified, the previously coded data were reexamined and recoded if necessary. Similar codes were grouped together into themes. For example, the textual response "to pick myself up" was coded under the code "to lift a low mood." Similar textual responses, such as "I play uplifting

music to cheer me up when I am feeling low," were included in this code. This code was grouped together with other similar codes such as "to maintain a good mood," under the theme "mood management."

Half the data set was randomly selected for triangulation by an independent sociological researcher who was blind to the original thematic coding. In order to reach agreement on codes and themes, researchers compared memos generated during the independent coding processes and discussed each code, putting forward a case until consensus was reached.

Ten themes emerged from the data. The relative prevalence of each theme was compared between groups using Pearson chi-square, with a Bonferroni adjusted  $\alpha$  level of .005 (0.05/10). The prevalence of each theme by group and collapsed across both groups is listed in Table 2, as a percentage. (Note that as the majority of participants nominated many reasons for listening to music, the percentages reflect the proportion of each group who nominated each theme and are not designed to total 100%).

## **Energy and Motivation**

The most commonly identified theme across the whole sample concerned "energy and motivation" and was the most commonly cited theme among the control group. The nondepressed participants were significantly more likely to nominate this theme than were participants with depression ( $\chi^2 = 17.92$ , df = 2, P < .001). Participants' responses for this theme included the following:

I listen to music to boost me up in the morning to feel better, to enhance my psychophysical state and reduce feelings of fatigue while exercising, jogging, or when am about to play football. (Control/10096791)

I will put energetic music on when doing housework and uplifting dance tunes on before going out. (Control/10937976)

want to get psyched for a dance concert play upbeat feel good songs. (Depressed/10919890)

When I go for a run I have to listen to dance music otherwise I'll end up walking. (Depressed/11002526)

#### Mood Enhancement

The second most commonly identified theme across the whole sample was "mood enhancement," with 39.4% of the participants stating that they used music to lift their mood generally, to enhance positive moods, or to help them out of negative moods.

When I feel sad or depressed I listen to my favourite pieces of music, which generally lifts my mood to a happier place. (Depressed/11401113)

When I am alone or driving, I often choose songs to lift or match an already elevated mood. (Depressed/11183763)

Table 2. Prevalence of Themes for Whole Sample and Depressed and Control Groups.

Theme	Total (N = 292) n (%)	Depressed (n = 148) n (%)	Control (n = 144) n (%)	$\chi^2$	Р
Energy and motivation	122 (34.2)	44 (29.7)	78 (54.2)	17.92	<.0001*
Mood management	114 (39.4)	47 (31.8)	67 (46.5)	6.69	.010
Relax or reduce stress	108 (37.0)	51 (34.5)	57 (39.6)	0.82	.365
Inspiration and stimulation	92 (31.5)	32 (21.6)	60 (41.6)	13.59	*000
Express, experience, and understand emotion	52 (17.8)	37 (24.9)	15 (10. <del>4</del> )	10.61	.001*
Focus and concentration	41 (14.0)	18 (20.5)	23 (15.3)	0.89	.349
To reflect mood	37 (12.7)	27 (18.2)	10 (6.9)	8.42	.004*
Escape, distraction, or immersion	30 (10.3)	21 (14.2)	9 (6.3)	5.71	.017
To reminisce	18 (6.2)	10 (6.8)	8 (5.6)	6.08	.014
Solace	15 (S.I)	10 (6.8)	5 (3.5)	1.62	.204

<sup>\*</sup>P < .005.

I generally listen to upbeat music no matter what my mood is because it reinforces a happy mood or lifts me out of a low mood. (Control/9597682)

I always use music to lift my spirits and it always does work. (Control/11578659)

## Relax or Reduce Stress

The third most common theme across the whole sample was "relax or reduce stress." This was the most common theme among the group with depression. Responses included the following:

When I am tired and I come home from a hard day and all I want to do is just unwind, I close my bedroom curtains and blinds so my room is completely dark then I will light scented candles and listen to classical music and just concentrate on breathing relaxing and unwinding to help me feel better and calmer. (Depressed/9976612)

Sometimes I put on some classical or new-age music when I'm feeling stressed and want to wind down. (Depressed/10964473)

At home cooking dinner with a glass of wine—I would choose a leisurely, most often classical selection to relax and enjoy what I am doing. (Control/10349431)

To relax after a stressful day. (Control/11225920)

## Inspiration and Stimulation

"Inspiration and stimulation" was the fourth most prevalent theme among the whole sample, encompassing such reasons as "for mental stimulation," "for enjoyment," and "to be creative." This theme was significantly more prevalent among the control group ( $\chi^2 = 13.59$ , df = 2, P < .001).

If I feel creative or want to write/draw creatively, I listen to music that heightens my emotions and stimulates my mind. This means that the music is usually lively. It makes me feel alert and my feelings are intensified and heightened positively. (Control/9690132

For inspiration in my own song writing. (Depressed/9699613)

This theme also encompassed reasons such as "when bored or doing something boring" such as housework or while driving. Many participants would describe situations in which they would play music, without describing whether there was an associated reason, such as for enjoyment, to help pass the time, to lift their mood, or to increase motivation. Other reasons included "while studying," "while walking," and "while reading."

When in the garage doing men things I just put on the radio. (Control/9765442)

As background music during the day. (Depressed/9920535)

## To Express, Experience, or Understand Emotion

The fifth most common theme overall was "to express, experience, or understand emotion." This was significantly more prevalent among the group with depression ( $\chi^2 = 10.61$ , df = 2, P = .001). It included such reasons as "to release emotion," "to release anger" and "to understand my emotions."

Sometimes I use music to unravel emotions and deconstruct blocks that I may feel because of creeping depression or a depressive episode. I feel it helps me not feel isolated and understand feelings. (Depressed/9670088)

I play certain music really loudly in order to express anger. (Depressed/10196170)

I always listen to music after a relationship breakup. At these times, I especially listen to the lyrics and find it an extremely effective way to express emotion. (Control/11645388)

If I am feeling emotional (sad) I sometimes listen to moving songs to help vent the sadness and get it out. (Control/10937976)

## Focus and Concentration

The sixth theme identified was "focus and concentration." This encompassed reasons such as "to block out distractions" and "to think or process thoughts."

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At work I used it to concentrate/focus—drown out distracting background noise. (Depressed/10660977)

I put on classical music on the way to work because the lack of words enables me to process my upcoming day and formulate ideas. (Control/11500074)

## To Match or Reflect Mood

This theme was characterized by a need to match music to emotion, as opposed to manipulating a low mood by playing contrary music. This theme was significantly more prevalent among the group with depression ( $\chi^2 = 8.42$ , df = 2, P = .004).

When I feel depressed I often listen to sad music. This helps and doesn't help. I'm not trying to pretend to be other than I am which is good but it doesn't always make me feel any happier either. (Depressed/9889255)

I tend to enjoy listening to music that is congruent with my mood—listening to upbeat music when I am in a contrary mood makes both the track and indeed myself feel shallow. (Depressed/11400827)

I choose music to reflect mood not to change it. When music is out of kilter with mood it jars. (Control/11157709)

A number of statements by the group with depression suggested that by reflecting mood, music sometimes allowed their mood to improve:

I find sometimes playing sad music when I feel sad helps me overcome the feeling. (Depressed/11024553)

When I feel down and I listen to music that echoes those feelings I no longer feel so alone and can move past that blue patch. (Depressed/11265583)

However, other statements suggest that sometimes mood did not improve:

I am currently experiencing a relapse with my depression and am only capable of listening to sad or melancholic music. At the moment I am replaying 3-4 sad songs through my mp3 player. It's what I call feeding the dog. (Depressed/11383832)

#### Escape, Distraction, or Immersion

The eighth theme was "escape, distraction, or immersion." Several participants in the group with depression used music to take their mind of troubles or thoughts:

If I am feeling down I often listen to world music as the rhythms and different instruments seem to help take my mind off troubles. (Depressed/9947252)

I use John Lennon when I want to escape from my thoughts. (Depressed/10835415)

Among the control group, several participants described using music for immersion:

Music has the ability to provide the feelings of a holiday when one is just not possible. At any time a home can turn into any exotic destination with the help of music. (Control/11003516)

#### To Reminisce

The ninth theme was "to reminisce," with similar response rates across groups.

I use music in my free time to enjoy the song, the lyrics, and bring back the memories associated with that era. (Control/11068075)

Sometimes I will play a song that reminds me of someone I miss very much. (Control/11044193)

## Solace

The final theme was "solace," which encompassed reasons such as "when feeling lonely," "to know others feel the same," or "to feel understood."

When I'm in a dark place I often put music on that is dark or in which the artist expresses sadness, despair, depression, hopelessness, hurt. Because it is something that I can relate to and that I understand and it feels like they would understand what I'm feeling too. It makes me feel less alone. (Depressed/10990591)

Music can double as company too if alone. (Control/11617956)

## **Discussion**

The current study utilized qualitative analysis to compare the reasons why people with and without depression listen to music. There are a number of limitations to this investigation. First, data were obtained from individuals who visited a website for resources about depressive disorders; while those with current depression or a history of depression or bipolar disorder were excluded from the control group, it remains that there is an immediate screening bias present. Second, it is assumed that participants would have enough self-awareness to accurately report how and why they listen to music. In fact, the reasons why people listen to music are likely to be varied, complex, and not always at the forefront of one's awareness. In addition, the diverse motivations behind music listening are unlikely to be totally captured by a retrospective questionnaire.

This is the first study to examine how and why persons with depression listen to music under quasi-controlled conditions. Qualitative analysis revealed 10 themes relating to reasons for listening to music. The themes identified are broadly consistent with those identified by previous research. Participants with depression and nondepressed (control) participants nominated similar reasons for listening to music; however, the

groups differed in regard to the prevalence with which they nominated certain themes.

A Finnish study<sup>27</sup> seeking to understand the reasons why people enjoyed listening to sad music found that sadness was "the most salient emotion" evoked by excerpts of sad music. However, their findings were confounded by other positive emotions (such as nostalgia, peacefulness) being present and interpreted as "sad." They reported that personality traits of "openness to engagement" and "empathy" led to more intense emotional responses and greater appreciation of beauty prompted by sad music. However, their study was of university students and did not include any consideration of the effect of depression on music perception.

Our study found that the use of music to "express, experience, or understand emotion" was more prevalent among participants with depression. While it seems intuitive that participants with depression would listen to music for emotional expression, Chen, Zhou, and Bryant<sup>22</sup> suggest a potential theoretical explanation for this. Based on Larsen's 28 control theory of affect regulation, they propose that efforts toward mood regulation should be increased when the mood requiring regulation is more salient. Perhaps listening to music represents an attempt to bring emotions to the forefront of one's attention in order that they are dealt with. This is consistent with McFarland and Buehler's 29,30 theory that mood regulation is a 2-step process; one must first acknowledge one's mood state before taking steps to regulate it. Indeed, repression of negative mood has been associated with reduced expression and experience of positive emotion and increased experience of negative emotion. 31,32

The need to listen to music to match or reflect mood was more prevalent among participants with depression. The findings are consistent with previous studies, which report that adolescents with depression, <sup>15,22</sup> those in negative moods<sup>22</sup> and romantically disenchanted young adults, 16 did not always select music that conveyed positive emotion. Garrido and Schubert<sup>19</sup> suggest that the ruminative aspect of depression may lead a person with depression to listen to sad music. Rumination, in psychology, refers to the tendency to bring a thought back to mind over and over and is known to be strongly associated with depression.<sup>33</sup> Schubert<sup>34(p25)</sup> suggests that when negative emotions are activated in an aesthetic context, a "dissociation node" is triggered, which inhibits the displeasure circuits of the brain. Thus, the arousal produced by the negative emotion is able to be experienced without the usual accompanying displeasure. Huron<sup>35</sup> suggests that high concentrations of the hormone prolactin, which increases during sadness to produce a consoling psychological effect, may be associated with pleasurable music-induced sadness, whereas low prolactin concentrations may be associated with unpleasant music-induced sadness.

It remains unclear whether listening to sad music helps to dissipate, or simply perpetuates, a negative mood. Garrido and Schubert<sup>19</sup> conclude that the effect of sad music on mood may vary according to individual differences. This is consistent with the finding that liking for negative emotion in music was associated with the personality dimension of absorption but not with dissociation, fantasy proneness, empathy, and

rumination.<sup>36</sup> Indeed, some respondents in the current survey reported that sad music allowed their negative mood to dissipate, while others reported that it was prolonged. It is also possible that the type of depression may be a factor, given that certain depressive subtypes have been associated with distinct personality traits<sup>37</sup> and cognitive styles.<sup>38</sup> If listening to sad music does allow a sad mood to be resolved for some, then attraction to negative emotion in music would not necessarily run counter to mood management theory.

People without depression were more likely to endorse the themes of "energy and motivation" and "inspiration and stimulation." The use of music for stimulation may be considered consistent with optimal arousal theory, which assumes that for each individual there is an optimum level of arousal that is most comfortable. Understimulation or overstimulation can be unpleasant, which will drive the individual to seek activities or environments that optimize his or her level of arousal. <sup>39,40</sup> The lower prevalence of these themes among people with depression may reflect the loss of interest or pleasure and low energy that characterize depression.

Another Finnish group 41,42 compared clinically depressed patients with nondepressed controls. They found that the patients with depression had a negative bias in their evaluation of music and that some depressive states flattened their emotional response to music. 41,42 They also found that patients with depression disliked music with "high energetic arousal" (which is associated with motivation and approach behaviors) and speculated such music may be challenging to patients with depression, 42 as depression was associated with poor motivation, low energy, and avoidance behaviors. The current findings would seem to support these speculations, which are also consistent with other possible mechanisms raised above.

In conclusion, there has been growing interest in the use of music for mood regulation, in terms of both who uses it and how it is used. However, the general findings do not necessarily pertain to people who have a significantly depressed mood and who may use music for different reasons (some with potential to improve depression, but some to maintain or worsen depressive symptoms). In addition, people who are depressed do not necessarily form a homogenous group—there may be significant character differences, depending on depression type and severity and premorbid personality style.

These findings could have important clinical applications. More research is needed on whether music has potential as an intervention in people with depression: in the short term, to facilitate behavioral activation and concentration and, in the longer term, to assist people to deal with potentially traumatic and stressful situations that precipitate anxiety and depression and also to improve emotional regulation.

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