



Adolescent Reaction to Signs of Depression Through Social Media

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INTRODUCTION

- Approximately 25% of college students share Facebook posts that demonstrate depressive symptoms online
 - Previous studies evaluate the capabilities of computer programs to accurately assess the mental health of social media users
 - Little is known about how adolescents react to social media posts that exhibit signs of depression.
- Purpose:**
- The purpose of this study is to understand how adolescents react to social media posts that exhibit symptoms of depression.

METHODS

Study Design and Settings:

- Content analysis of example tweets exhibiting signs of depression
- Survey of adolescents

1. Content Analysis:

Post Selection:

- Posts were found on Twitter
- Only posts that contained #depression, were written in English, and were public were included in this study
- Posts with images were excluded

Variables:

- Posts were coded with the DSM-IV criteria: depressed mood, decreased interest in activities, changes in appetite, insomnia or hypersomnia, agitation or slowing down of movement, fatigue, feelings of worthlessness or guilt, difficulty concentrating, and recurrent thoughts of death
- Codebook used had been verified in a previous study

1. Survey:

Participants:

- A sample of adolescents age 14-18 years
- Participants were recruited through Facebook, Twitter, and Reddit

Variables:

- Adolescents first asked to rate symptoms from the DSM-IV criteria based on how indicative of depression they thought the symptom was with 1 being least indicative and 10 being most indicative
- Adolescents were then presented with an example post that showed symptoms of depression, and asked participants what action they would take if they saw this post

RESULTS

1. Content Analysis:

- Five tweets were selected that exhibited varying symptoms from the DSM-IV Criteria

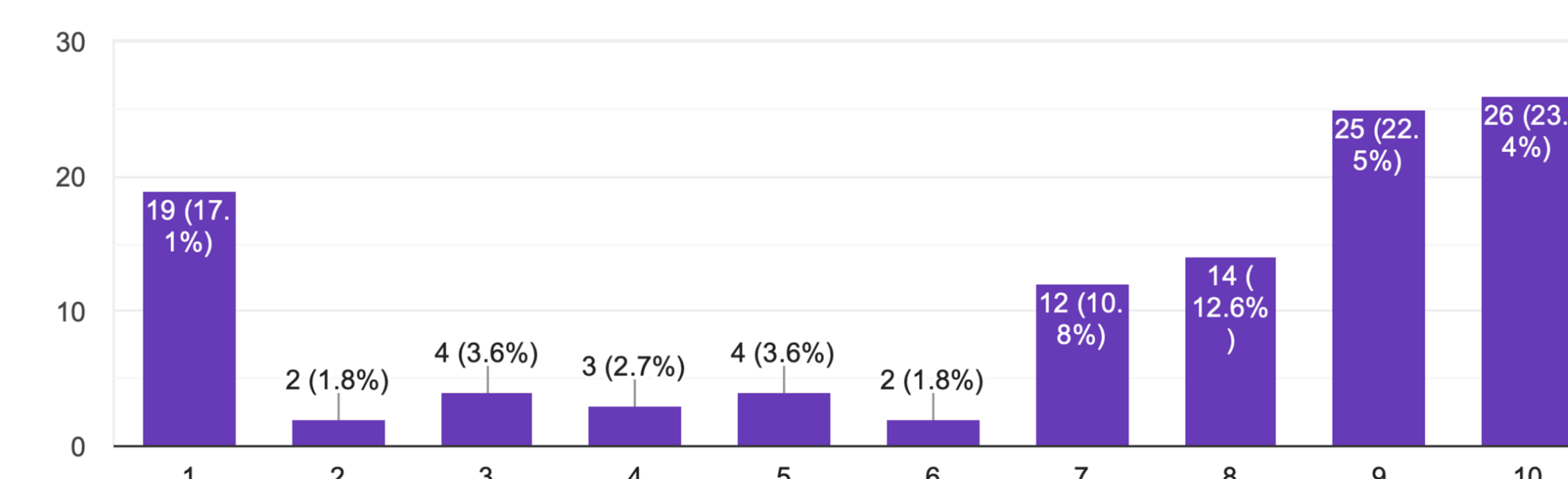
1. Survey:

Demographics:

- 111 adolescents completed the survey
- Average age of 16 years

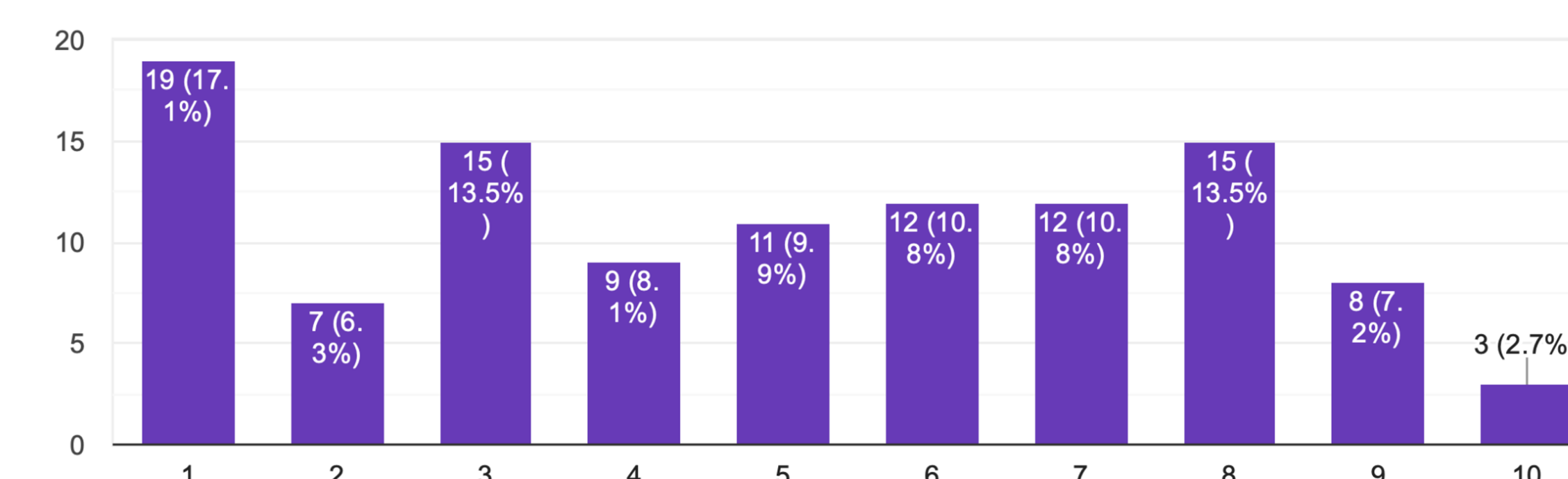
DSM-IV Criteria Symptom Evaluation:

Feelings of worthlessness or guilt
111 responses



- Of the nine symptoms, adolescents strongly identified “feelings of worthlessness or guilt” as a symptom of depression

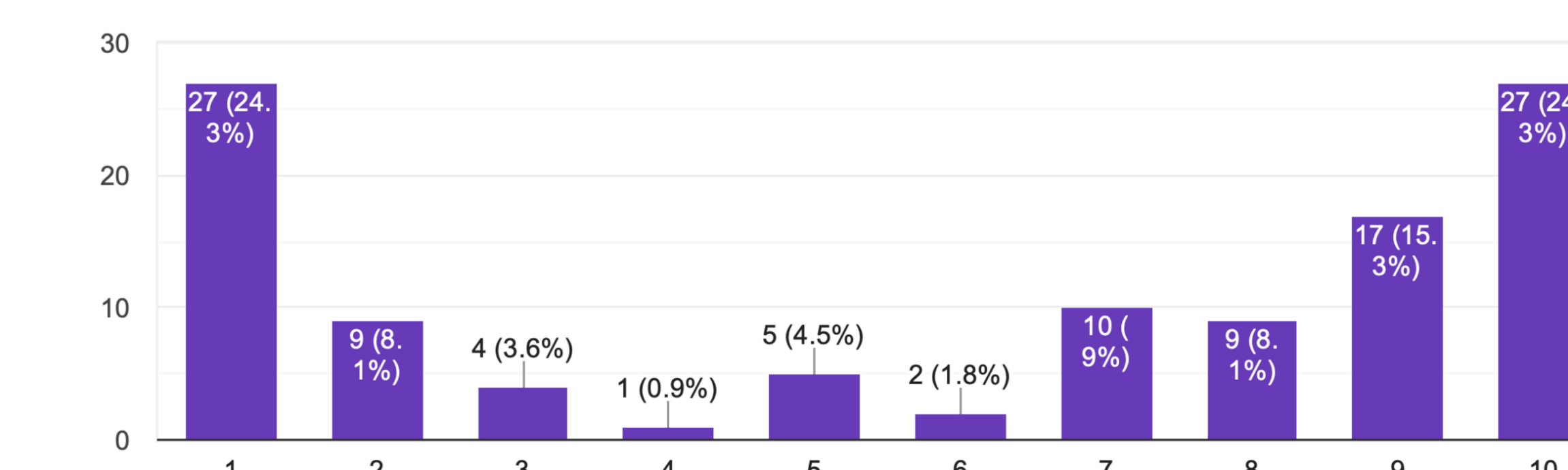
Agitation or slowing down of movement
111 responses



- Adolescents only weakly identified “agitation or slowing down of movement” as a symptom of depression.

RESULTS

Recurrent thoughts of death
111 responses

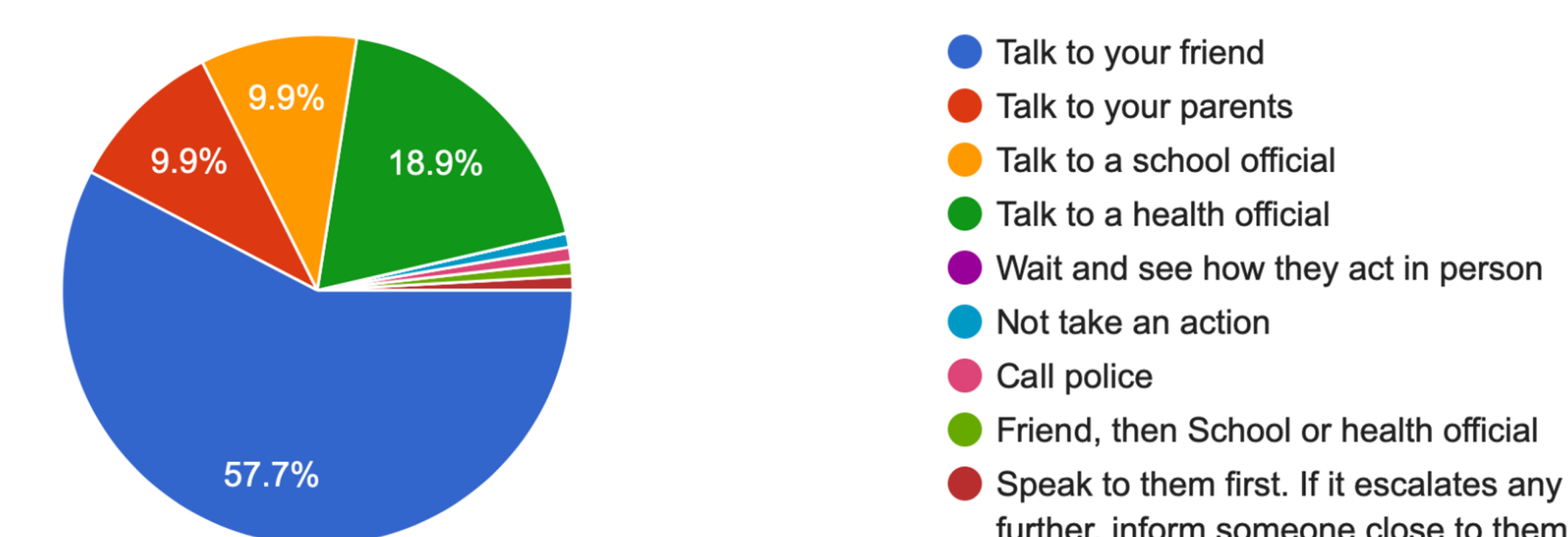


- The symptom “recurrent thoughts of death” received just as many 1’s as 10’s with 27 each

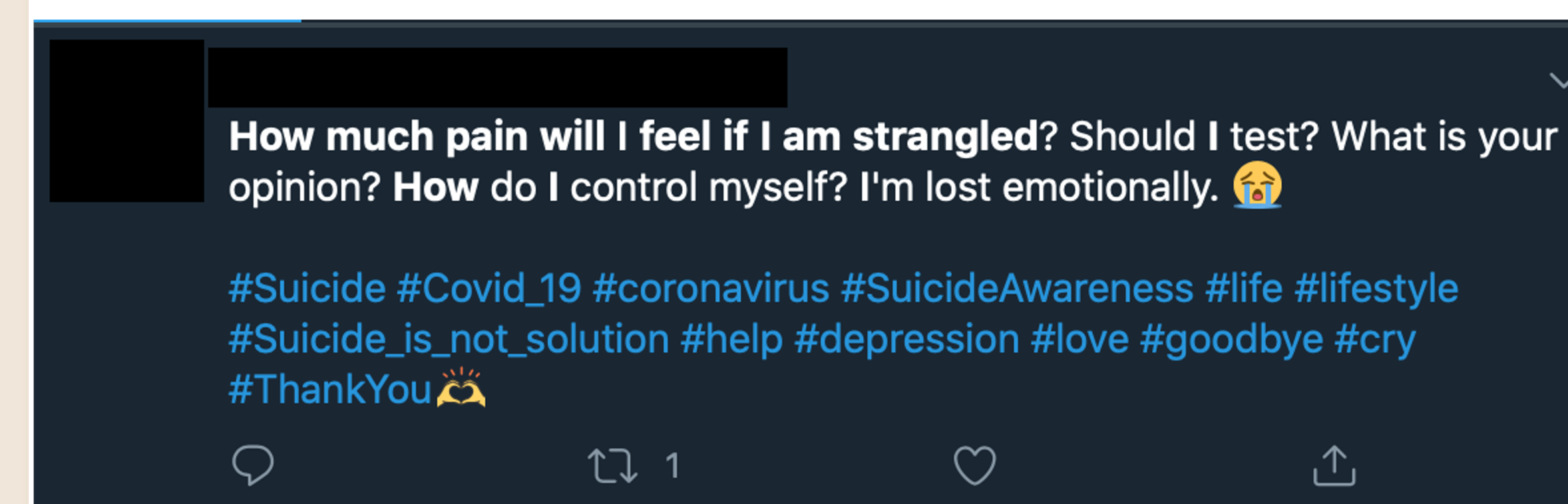
Response to Social Media Posts:

- Every single example post had the majority of responses as “talk to the friend”

"How much pain will I feel if I am strangled? Should I test? What is your opinion? How do I control myself? I'm lost emotionally."
111 responses



- The only post that didn’t have over 70% of responses as “talk to the friend” was the one that made direct references to self-harm.



CONCLUSIONS

- The average adolescent correlated symptoms from the DSM-IV Criteria with depression
- When adolescents see their friend post posts on social media that demonstrate signs of depression, most will talk to their friend rather than immediately seeking parental or professional guidance
- Adolescents could be used as a reliable way to pick up on symptoms of depression on social media posts
- By understanding how adolescents react to posts on social media, healthcare providers could develop better methods of finding and assisting adolescents who are experiencing early signs of depression

ACKNOWLEDGEMENTS

- Moreno MA, Jelenchick LA, Egan KG, et al. Feeling bad on Facebook: depression disclosures by college students on a social networking site. *Depress Anxiety* 2011;28(6):447-55 PMID: 21400639
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