

A Light Roasting: How the r/Coffee Online Forum Challenged Misinformation Around Mycotoxins and America's Favorite Beverage

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Introduction

Misinformation about contaminants in food is widespread online

Self-regulation Little is known about how communities respond to such claims

Mycotoxins Wellness influencers and companies who market "mold-free" coffee products falsely claim that "regular" mycotoxins are abundant enough in coffee mycotoxins to cause gastrointestinal and neuropsychiatric symptoms, and that levels of mycotoxins are not monitored.

Research Question

How do online communities discuss and respond to misinformation about harmful amounts of mycotoxins in coffee?

Anatomy of a Reddit Post

This content is the original post.

↑ 0 ↓ Net of upvotes and downvotes ○ 11 Number of comments

pfflick ← Username · 1d ago

This user posted a comment.

↑ 9 ↓ ○ Reply ○ Award → Share ...

Net votes per comment

The_Gandalodore · 1d ago

This user posted a comment.

↑ 7 ↓ ○ Reply ○ Award → Share ...

eymen9200 OP · 1d ago

A reply to a comment, which we count as a comment. OP means original poster

↑ 0 ↓ ○ Reply ○ Award → Share ...

Methods

We performed a retrospective analysis of all posts to the r/Coffee Reddit forum r/Coffee began in March 2008 and has 1.9 million members We included posts from March 2008 to July 2025 that contained the word "mycotoxin" or a spelling variant We coded comments as Refuting Questioning Agreeing For each comment we recorded upvotes, a measure of community endorsement of the comment's content, and whether comments provided explanations or cited sources

Screened all public comments in r/coffee from Mar 2008 to July 2025, (n = 5,591)

Excluded (n = 4,726)

Included: Contained "mycotoxin" or related phrase (n = 35 posts) ⇒ 865 unique comments

Analysis Plan

- Thematic Coding** We coded comments as refuting, questioning, or agreeing with the theme that mycotoxins are in coffee.
- Community Engagement** Upvotes are a measure of community endorsement of the comment's content
- Evidence Base** and whether comments provided explanations or cited sources

Description of Data Set

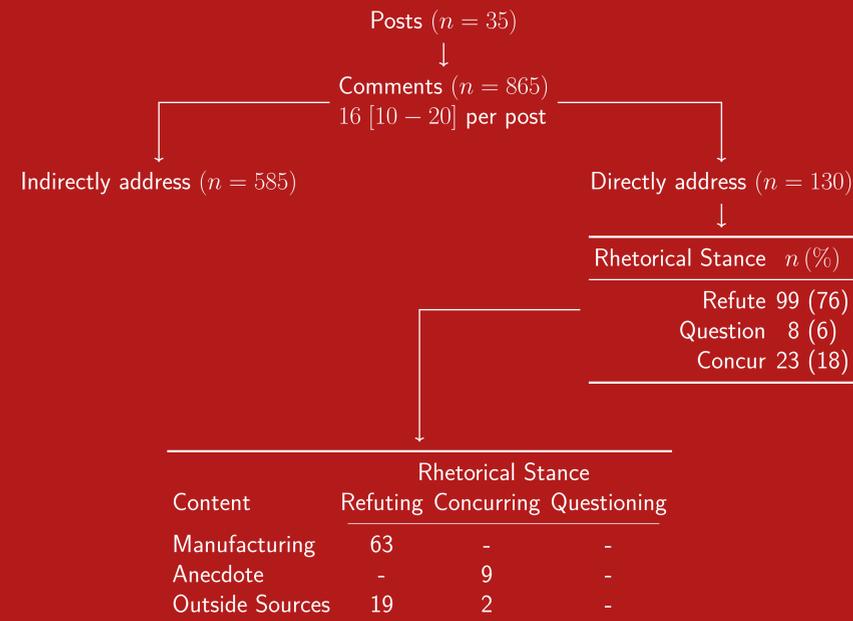


Table 1. **Comments more frequently refuted the hazards of mycotoxins in coffee, and Comments that refuted more frequently referenced outside information on coffee production.** Cell values are counts of comments. Percentage of subpopulation in parentheses. Dash indicates no comments in sample.



Fig. 1. **Left: Refuting or questioning comments received more upvotes than comments supporting the misinformation and Right: Comments with explanations received more upvotes than comments with only citations or no explanations.** Whiskers show minimum and maximum. Box shows interquartile range. White line denotes median.

Try Our Online Tool

QR code to misinfo predictor

Example Comments

Supporting Concern

- Does anyone have recommendations for coffee that's third party tested for mold but you can still buy it relatively fresh? My husband is a snob about fresh roasted whole beans for his espresso but I am worried if I order a mold-free coffee online it'll be pretty old by the time it arrives ...
- That's the problem. A lot of coffee is bad, especially the ones that you find at the grocery store... most coffee the big box kind has mold toxins and pesticides to keep along shelf life.
- That's the problem. A lot of coffee is bad, especially the ones that you find at the grocery store most coffee the big box kind has mold toxins and pesticides to keep along shelf life. I got turned onto Pangea coffee Co. they have toxin free coffee. That's also allergen free.

Refuting Concern

- There is no actual evidence of a significant amount of mycotoxins in coffee... every source points back to Asprey, there is no scientific, peer-reviewed study.
- The mycotoxin limits in Europe are extremely high... coffee would spoil and be unsaleable long before it ran afoul of mycotoxin limits
- Actually look up academic, scientific research on mycotoxins in coffee... skip the crunchy granola mom blogs and the TikTok videos.

Questioning

- "Are you allergic to any molds? Naturals can be prone to at least a small amount of mold growth during drying, and leftover mycotoxins will not be destroyed by roasting or brewing."
- Fun fact, Dave Asprey promotes that other coffee has mycotoxins and his doesn't, when in actuality his has trace amounts when the majority of other coffees actually don't.

Conclusions

Most visible refutations used narratives. Refuting comments received most upvotes if they included an explanation with sources cited 4 [1.5 – 9.5] than if they did not include a narrative 2 [1– 5].

Choice of Sources Refuting comments cited manufacturing processes demonstrating that coffee, in general, does not have appreciable levels of ochratoxin A or aflatoxins. Supporting comments cited the sources discussing the potential dangers of those mycotoxins.

Auto-regulation Comments providing explanations or citing sources received more engagement than those that did not. Our findings suggest that some online communities may effectively self-correct misinformation, highlighting opportunities for collaboration between domain experts and engaged lay communities

Limitations One social media community, which may not adequately sample the relevant population, our use of manual coding of comments, small overall number of comments. In r/Coffee, misinformation about mycotoxins was challenged through domain-specific explanations and the citing of academic and governmental sources

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