

# Google Alerts for detection of contract cheating

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## Google alerts for detection of contract cheating

### What problem does it solve?

- Detect improper sharing of test and assignment questions to chegg.com and (potentially) other websites where contract cheating can occur.
- Minimise cognitive burden: set and forget.
- Google crawls the entire web frequently and so alerts are typically received within hours of a question appearing.
- Quick detection acts as disincentive to cheat, and reduces exposure of questions and solutions in the wild.

### How does it work?

- Prior to release of the assessment, set up a Google Alert that searches for text fragments from the assessment.
- If any hits are detected you will receive an email alert from Google with the URL.

- Google Alerts URL: <https://google.com/alerts> (you will need a Google account).
- Search text: 32 words or less. Options: As-it-happens, All results.
- Chain together with OR operator "rare" text snippets in double quotes.
- E.g.: "Sketch the graph of an even function  $f(x)$  that is defined for" OR "Sketch the graph of an odd function  $g(t)$  that is defined for" OR "function. Determine if the function"
- For individualised assessments ensure that snippets are common to all versions.
- 6 words of mathematical text, even with common words, will result in few hits.

Monitor the web for interesting new content

Search: "Sketch the graph of an even function  $f(x)$  that is defined for" OR "Sketch ..."

How often: As-it-happens

Sources: Automatic

Language: English

Region: Any Region

How many: All results

Deliver to: clisby@gmail.com

Update alert Hide options

#### Alert preview

There are no recent results for your search query. Below are existing results that match your search query.

WEB

3. [5 marks] Let  $A \in \mathbb{R}^{2 \times 2}$  be an even function,  $B \in \mathbb{R}^{2 \times 2}$  an - Chegg  
 Chegg  
 Answer to 3. [5 marks] Let  $A \in \mathbb{R}^{2 \times 2}$  be an even function,  $B \in \mathbb{R}^{2 \times 2}$  an

Google Alerts <googlealerts-noreply@google.com> [Unsubscribe](#)  
 to me

#### Google Alerts

"Sketch the graph of an even function  $f(x)$  that is defined for" OR "Sketch the graph of an odd function  $g(t)$  that is defined for" OR "function. Determine if the function"

As-it-happens update · October 9, 2021

WEB

1. [10 marks] Sketch the graph of an even function | Chegg.com

Chegg

Transcribed image text: 1. [10 marks] Sketch the graph of an even function  $f(x)$  that is defined for all  $x \in \mathbb{R}$  and which has the following properties.  $f(0) = 1$



Flag as irrelevant

2. [10 marks] Sketch the graph of an odd function | Chegg.com

Chegg

Transcribed image text: 2. [10 marks] Sketch the graph of an odd function  $g(t)$  that is defined for  $t \in \mathbb{R}$  and which has the following properties.  $\lim_{t \rightarrow 0} g(t) = 0$

## Google alerts for detection of contract cheating

- We have received various alerts from chegg.com that have detected cheating. (False positives: [Quizlet](#), [Brainly](#), 4chan, [Numerade](#), [Byjus](#), [Gauthmath](#).)
- Chegg is indexed by Google. This is Chegg's choice, presumably because it drives traffic to their site and improves profits.
- Detection relies on students not modifying the question text.
- Chegg will takedown questions within a couple of days of a request, and provide account information of question submitter.
- Typically this account information will not identify the student, as users can sign up with any email address.
- Ideally: generate unique questions for each student, and that way identification can occur purely based on question that has been shared.
- Nathan Clisby & Antony Edwards (2021) Individualized summative assessments as used during COVID-19, International Journal of Mathematical Education in Science and Technology, DOI: [10.1080/0020739X.2021.1982040](https://doi.org/10.1080/0020739X.2021.1982040)