**Scenario**

We have a fictitious log file of JSON data that gives us information on files that were seen by users and whether it is safe or not (disposition).

JSON format:

```

ts:  timestamp

pt:  processing time

si:  session ID

uu:  user UUID

bg:  business UUID

sha: sha256 of the file

nm:  file name

ph:  path

dp:  disposition (valid values: MALICIOUS (1), CLEAN (2), UNKNOWN (3))

```

The JSON entries are not guaranteed to be valid.  Your task is to write an application that processes each valid line in the file, and then print out a list of unique extensions and the number of unique filenames for that extension.

For example, given these 3 lines:

{"ts":1551140352,"pt":55,"si":"3380fb19-0bdb-46ab-8781-e4c5cd448074","uu":"0dd24034-36d6-4b1e-a6c1-a52cc984f105","bg":"77e28e28-745a-474b-a496-3c0e086eaec0","sha":"abb3ec1b8174043d5cd21d21fbe3c3fb3e9a11c7ceff3314a3222404feedda52","nm":"phkkrw.ext","ph":"/efvrfutgp/expgh/phkkrw","dp":2}

{"ts":1551140352,"pt":55,"si":"3380fb19-0bdb-46ab-8781-e4c5cd448074","uu":"0dd24034-36d6-4b1e-a6c1-a52cc984f105","bg":"77e28e28-745a-474b-a496-3c0e086eaec0","sha":"abb3ec1b8174043d5cd21d21fbe3c3fb3e9a11c7ceff3314a3222404feedda52","nm":"asdf.pdf","ph":"/efvrfutgp/asdf.pdf","dp":2}

{"ts":1551140352,"pt":55,"si":"3380fb19-0bdb-46ab-8781-e4c5cd448074","uu":"0dd24034-36d6-4b1e-a6c1-a52cc984f105","bg":"77e28e28-745a-474b-a496-3c0e086eaec0","sha":"abb3ec1b8174043d5cd21d21fbe3c3fb3e9a11c7ceff3314a3222404feedda52","nm":"phkkrw.ext","ph":"/efvrfutgp/expgh/phkkrw","dp":2}

We would expect the output:

ext: 1

pdf: 1

Feel free to use any languages/tools you’d like. We like to see reasonable test coverage.

Ideally, you can send us a link to GitHub, GitLab, etc.  You have one week from the time of receiving this email to submit your answer. Please email us with any questions.