Ransomware Detector

- This program use **watchdog observer** and looking for changes in the local file and handle each change.
- We use the assumption that before activating the tool there is no such threat.
- Use some technique detections such as:
  - Check if new word is valid – by unexpected signs in word.
  - Check if file extension is valid – we assume that the directory contains only .txt files.
  - Sign all the files with magical sign – if changed then it is suspicious.
  - Encryption detection by number of word appearance – following "Shannon Entropy" technique.
  - Limit the number of deletions in period of time.
  - Unexpected file moving – we assume that the files not should move to another directory.