Create a data extractor class that knows how to manipulate data

1. Create a class that accept a pathlib.Path as its only parameter

2. Upon instantiation, read JSON data from file into a dict (pathlib, json, dict).

2. Create a method that proccesses the data when invoked, like so:

a. For datetime values, load it change the year of it to 2021 (datetime)

b. For strings, remove all whitespaces and reverse the string

c. For lists, remove duplicates

3. Create a method that saves the processed data to a new file in JSON format (pathlib)

Consider the following:

- Use python 3.9.

- Loaded data can be corrupt (invalid JSON), in such case print "Bad input"

- Assume that valid datetime format is "YYYY/MM/DD HH:mm:ss"

- There is more than 1 way to do all off this, don't worry about performance optimization

- Use python standard naming conventions

- Bonus points for adding tests using unittests module

- Extra bonus points for tests using pytest (a 3rd party library)