

TODO: Potentially make another package for this

import json

import os

from typing import Any

import re

import shutil

import tempfile

from swarms.utils.loguru_logger import initialize_logger

logger = initialize_logger(log_folder="file_processing")

def check_if_folder_exists(folder_name: str) -> bool:

"""

Check if a folder exists at the specified path.

Args:

folder_name (str): The path to the folder to check.

Returns:

bool: True if the folder exists, False otherwise.

"""

try:

return os.path.exists(folder_name) and os.path.isdir(

folder_name

)

```
except Exception as e:
```

```
    logger.error(f"Failed to check if folder exists: {e}")
```

```
    return False
```

```
def zip_workspace(workspace_path: str, output_filename: str):
```

```
    """
```

```
    Zips the specified workspace directory and returns the path to the zipped file.
```

```
    Ensure the output_filename does not have .zip extension as it's added by make_archive.
```

```
    """
```

```
    try:
```

```
        temp_dir = tempfile.mkdtemp()
```

```
        # Remove .zip if present in output_filename to avoid duplication
```

```
        base_output_path = os.path.join(
```

```
            temp_dir, output_filename.replace(".zip", "")
```

```
        )
```

```
        zip_path = shutil.make_archive(
```

```
            base_output_path, "zip", workspace_path
```

```
        )
```

```
        return zip_path # make_archive already appends .zip
```

```
    except Exception as e:
```

```
        logger.error(f"Failed to zip workspace: {e}")
```

```
        return None
```

```
def sanitize_file_path(file_path: str):
```

```
"""
```

Cleans and sanitizes the file path to be valid for Windows.

```
"""
```

```
try:
```

```
    sanitized_path = file_path.replace("`", "").strip()
```

```
    # Replace any invalid characters here with an underscore or remove them
```

```
    sanitized_path = re.sub(r'[<>:"\\|?*]', "_", sanitized_path)
```

```
    return sanitized_path
```

```
except Exception as e:
```

```
    logger.error(f"Failed to sanitize file path: {e}")
```

```
    return None
```

```
def load_json(json_string: str):
```

```
    """
```

Loads a JSON string and returns the corresponding Python object.

Args:

json_string (str): The JSON string to be loaded.

Returns:

object: The Python object representing the JSON data.

```
"""
```

```
try:
```

```
    json_data = json.loads(json_string)
```

```
    return json_data
```

```
except json.JSONDecodeError as e:

    logger.error(f"Failed to decode JSON: {e}")

    return None
```

```
def create_file(

    content: str,

    file_path: str,

):

    """

    Creates a file with the specified content at the specified file path.
```

Args:

content (str): The content to be written to the file.

file_path (str): The path to the file to be created.

"""

```
try:
```

```
    with open(file_path, "w") as file:
```

```
        file.write(content)
```

```
    return file_path
```

```
except Exception as e:
```

```
    logger.error(f"Failed to create file: {e}")
```

```
    return None
```

```
def create_file_in_folder(
```

folder_path: str, file_name: str, content: Any

):

"""

Creates a file in the specified folder with the given file name and content.

Args:

folder_path (str): The path of the folder where the file will be created.

file_name (str): The name of the file to be created.

content (str): The content to be written to the file.

Returns:

str: The path of the created file.

"""

try:

if not os.path.exists(folder_path):

os.makedirs(folder_path)

Create the file in the folder

file_path = os.path.join(folder_path, file_name)

with open(file_path, "w") as file:

file.write(content)

return file_path

except Exception as e:

logger.error(f"Failed to create file in folder: {e}")

return None

```
def zip_folders(
    folder1_path: str, folder2_path: str, zip_file_path: str
):
    """
    Zip two folders into a single zip file.
```

Args:

folder1_path (str): Path to the first folder.

folder2_path (str): Path to the second folder.

zip_file_path (str): Path to the output zip file.

Returns:

None

```
"""
```

```
try:
```

```
    # Create a temporary directory
    with tempfile.TemporaryDirectory() as temp_dir:
        # Copy both folders into the temporary directory
        shutil.copytree(
            folder1_path,
            os.path.join(
                temp_dir, os.path.basename(folder1_path)
            ),
        )
```

```
shutil.copytree(
    folder2_path,
    os.path.join(
        temp_dir, os.path.basename(folder2_path)
    ),
)

# Create a zip file that contains the temporary directory
shutil.make_archive(zip_file_path, "zip", temp_dir)

except Exception as e:

    logger.error(f"Failed to zip folders: {e}")

    return None
```