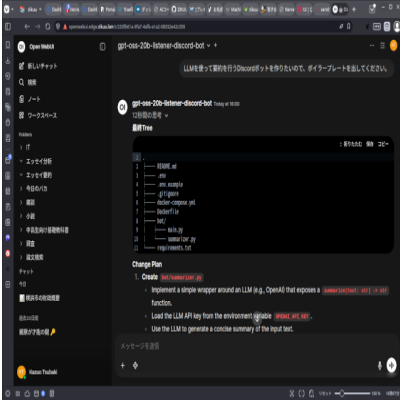




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Description

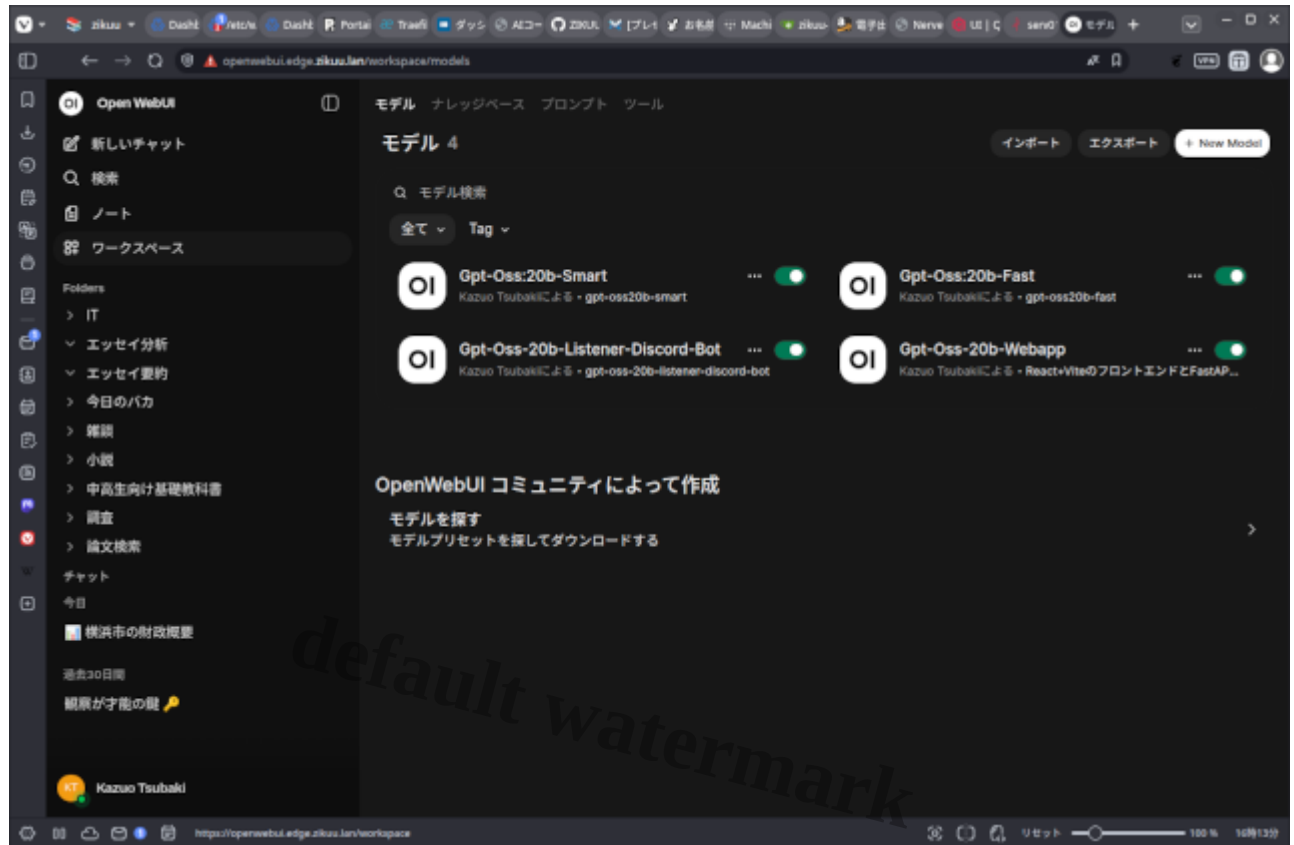
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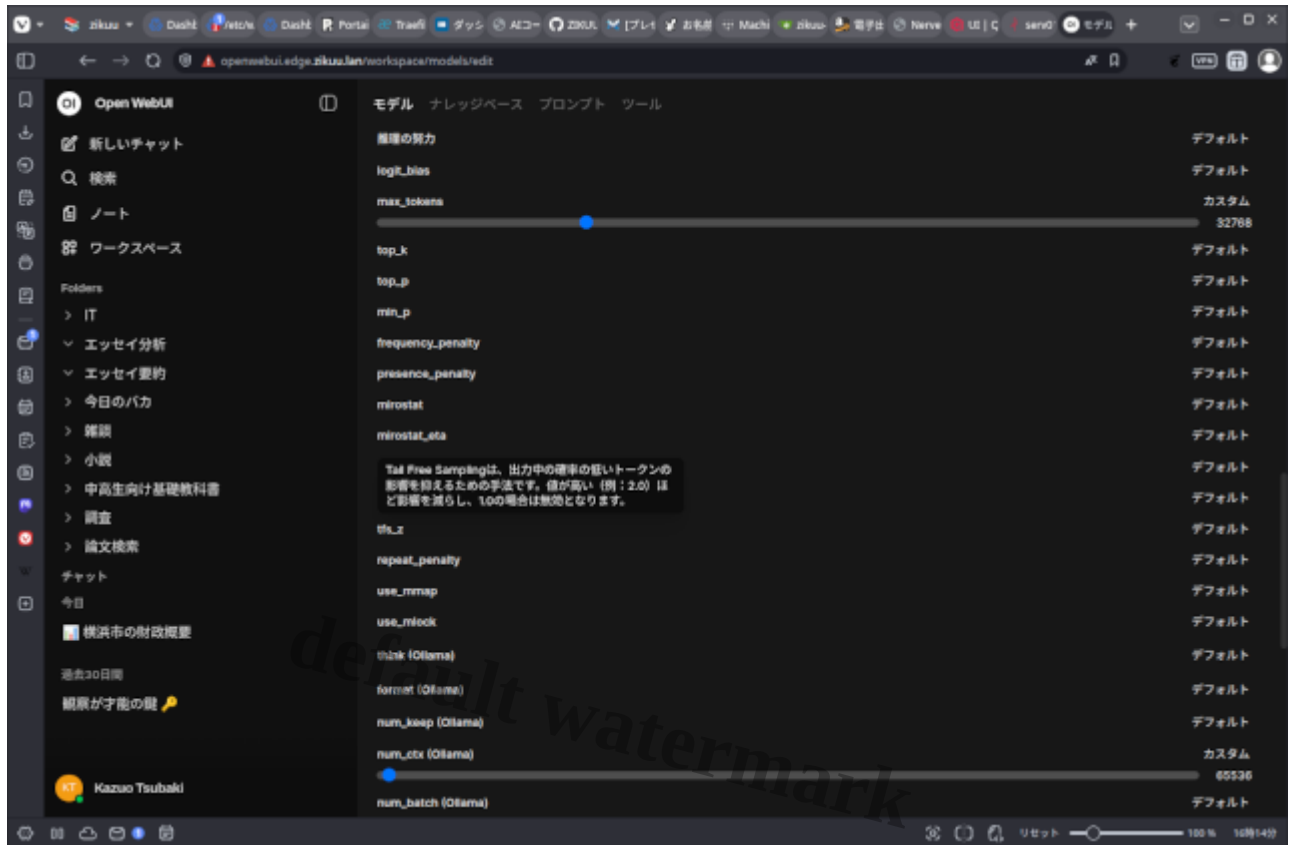
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```
* DISCORD_TOKEN
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Temperature•max_tokens•num_ctx (Ollama)•3•

- Temperature = 0.2~0.4
- max_token = 32K (32768)
- num_ctx (Ollama) = 64K (65536)

GPU RTX 2000 Ada Lovelace 16GB VRAM

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â??â??â?? bot/
â??  â??â??â?? main.py
â??  â??â??â?? summarizer.py
â??â??â?? requirements.txt
```

Change Plan

1. Create bot/summarizer.py

- Implement a simple wrapper around an LLM (e.g., OpenAI) that exposes a `summarize(text: str) -> str` function.
- Load the LLM API key from the environment variable `OPENAI_API_KEY`.
- Use the LLM to generate a concise summary of the input text.

1. Modify bot/main.py

- Import `summarizer`.
- Add an `on_message` listener that:
 - Checks if the message's channel ID is in the list obtained from `ALLOWED_CHANNEL_IDS`.
 - If allowed, calls `summarizer.summarize(message.content)` to get a summary.
 - Replies to the message with the summary (or a minimal acknowledgement if summarization fails).
- Ensure the bot only reacts to messages in the allowed channels.

1. Add .env.example

- Include placeholders for:
 - `DISCORD_TOKEN`
 - `ALLOWED_CHANNEL_IDS` (comma-separated)
 - `OPENAI_API_KEY`

1. Update requirements.txt

- Add `discord.py` and `openai` (or the relevant LLM client library).

1. Create Docker file

- Base image: python:3.11-slim.
- Copy requirements.txt and install dependencies.
- Copy the bot/ directory.
- Set environment variables (e.g., DISCORD_TOKEN, ALLOWED_CHANNEL_IDS, OPENAI_API_KEY).
- Run the bot with python -m bot.main.

1. Ensure docker-compose.yml references the new Dockerfile

- No changes needed if it already builds the image from the Dockerfile.

This plan adds the necessary files and modifications to implement a Discord bot that uses an LLM to summarize messages in allowed channels, while keeping the project structure and constraints intact.

```

# Dockerfile
FROM python:3.11-slim

COPY requirements.txt .

# Set environment variables
ENV DISCORD_TOKEN=
ENV ALLOWED_CHANNEL_IDS=
ENV OPENAI_API_KEY=

# Run the bot
CMD python -m bot.main

# docker-compose.yml
version: "3.9"

services:
  bot:
    build: .
    env_file: .env
    restart: unless-stopped

```

```

# Dockerfile
FROM python:3.11-slim

COPY requirements.txt .

# Set environment variables
ENV DISCORD_TOKEN=
ENV ALLOWED_CHANNEL_IDS=
ENV OPENAI_API_KEY=

# Run the bot
CMD python -m bot.main

# docker-compose.yml
version: "3.9"

services:
  bot:
    build: .
    env_file: .env
    restart: unless-stopped

```

```
RUN pip install --no-cache-dir -r requirements.txt
```

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COPY bot ./bot

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```
# ă??ă??ă?©ă?«ă??ă•®ă®?èî?ă?³ă??ă?³ă??
CMD ["python", "-m", "bot.main"]
```

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requirements.txtã•®ä,è°«ã??æ??ã•?ã•!ã•ã•ã•?ã•?ã•??

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requirements.txt

```
discord.py==2.3.2
openai==1.12.0
```

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bot/main.pyã®ä,è«ã??æ??ã?ã?|ã•ã•ã?ã?ã?ã??

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bot/main.py

```
import os
import discord
from discord.ext import commands
from bot import summarizer
```

```
# Ç??°â¢?â¤?æ?°ã•?ã??è`â®?ã??â•?â%?
DISCORD_TOKEN = os.getenv("DISCORD_TOKEN")
ALLOWED_CHANNEL_IDS = os.getenv("ALLOWED_CHANNEL_IDS", "")
# ã?«ã?³ã??â?°â??ã??ã•®æ??â?â??ã??æ?´æ?°ã•®ã?»ã??ã??ã•«â¤?æ•?
ALLOWED_CHANNEL_IDS = {
    int(ch.strip()) for ch in ALLOWED_CHANNEL_IDS.split(",") if ch.strip().isd
}
```

```
intents = discord.Intents.default()
intents.message_content = True # ã?;ã??ã?»ã?%ã?, æ?-æ??ã??å•?å%?ã•?ã??ã•?ã?•
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```



```
bot = commands.Bot(command_prefix="!", intents=intents)
```

```
@bot.event
async def on_ready():
    print(f"Logged in as {bot.user} (ID: {bot.user.id})")
```

```
@bot.event
async def on_message(message: discord.Message):
    # è?ªã??ã•®ã?ã??ã?»ã?¼ã?,ã•«ã•¬ã•ã¿?ã•?ã•ªã•?
    if message.author.id == bot.user.id:
        return

    # è¬±ã•¬ã•?ã??ã•?ã?•ã?£ã?³ã?•ã?«ã•?çç°èª•
    if message.channel.id not in ALLOWED_CHANNEL_IDS:
        return

    # è|•ç´?ã??ã•?ã¼?
    try:
        summary = await summarizer.summarize(message.content)
    except Exception as e:
        # ä½?ã??ã•?ã•®ã?¬ã?©ã?¼ã•?èµ•ã••ã•?ã??ç°iæ??ã¿?ç?
        summary = "è|•ç´?ã•§ã••ã•¼ã•?ã??ã•§ã•?ã•?ã??"

    # æ??ã°•é?•ã•®è¿?ã¿i
    await message.reply(summary, mention_author=False)

if __name__ == "__main__":
    bot.run(DISCORD_TOKEN)
```

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summarizerã?çã?,ã?¥ã?¼ã?»ã•®ã®?è£ã•¬ã©ã?ã•ã•£ã|ã•?ã¾ã•?ã•?i¼?

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bot/summarizer.py

"""
A very small wrapper around the OpenAI API that turns a piece of text
into a concise summary.

The module exposes a single coroutine:

```
async def summarize(text: str) -> str
```

It uses the `openai` Python package (see requirements.txt) and expects

the environment variable `OPENAI\_API\_KEY` to be set. If the key is missing or the API call fails, the function returns a short error message so that the bot can still reply with something useful.

```
"""
import os
import asyncio
from typing import Optional

import openai

# Load the API key once at import time
OPENAI_API_KEY: Optional[str] = os.getenv("OPENAI_API_KEY")
if OPENAI_API_KEY:
    openai.api_key = OPENAI_API_KEY

async def summarize(text: str) -> str:
    """
    Return a short summary of *text* using the OpenAI ChatCompletion API.

    Parameters
    -----
    text : str
        The original message content to summarise.

    Returns
    -----
    str
        A concise summary. If the request fails, a short error string
        is returned instead.
    """
    if not OPENAI_API_KEY:
        return "OpenAI API key not configured."

    # The request is performed in a threadâ??pool to avoid blocking the
    # event loop. The OpenAI library is synchronous, so we wrap it
    # with asyncio.to_thread.
    try:
        response = await asyncio.to_thread(
            openai.ChatCompletion.create,
            model="gpt-3.5-turbo",
            messages=[
                {
                    "role": "system",
                    "content": (
                        "You are a helpful assistant that produces short "
                        "summaries of the given text. Keep the summary to "
                        "one or two sentences."
                    )
                },
                {"role": "user", "content": text},
            ],
            temperature=0.2,
            max_tokens=60,
```

```
)  
# The assistant's reply is in the first choice's message content.  
summary = response.choices[0].message.content.strip()  
return summary or "è|•ç´?ã•šã••ã•¼ã•?ã??ã•šã•?ã•?ã??"  
except Exception as exc:  
# Log the exception if you have a logger; for now we just return  
# a userâ??friendly message.  
return "è|•ç´?ã•šã••ã•¼ã•?ã??ã•šã•?ã•?ã??"
```

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.env.exampleã•®å? å®¹ã??æ??ã•?ã•!ã??

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.env.example

```
# Discord bot token  
DISCORD_TOKEN=your_discord_bot_token_here  
  
# Commaâ??separated list of channel IDs the bot should listen to  
ALLOWED_CHANNEL_IDS=123456789012345678,987654321098765432  
  
# OpenAI API key for summarisation  
OPENAI_API_KEY=sk-XXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXXX
```

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.gitignoreã•®å? å®¹ã??æ??ã•?ã•!ã??

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.gitignore

```
# Byteâ??compiled / optimized / DLL files  
__pycache__/  
*.py[cod]  
*$py.class  
  
# C extensions  
*.so  
  
# Distribution / packaging  
.Python  
build/  
develop-eggs/
```

```
dist/
downloads/
eggs/
.eggs/
lib/
lib64/
parts/
sdist/
var/
wheels/
pip-wheel-metadata/
share/python-wheels/
*.egg-info/
.installed.cfg
*.egg
MANIFEST
```

```
# Virtual environment
.venv/
env/
ENV/
env.bak/
venv/
ENV.bak/
```

default watermark

```
# PyInstaller
# Usually these files are written by a python script from a template
# when you run pyinstaller.
*.manifest
*.spec
```

```
# Installer logs
pip-log.txt
pip-delete-this-directory.txt
```

```
# Unit test / coverage reports
htmlcov/
.tox/
.nox/
.coverage
.coverage.*
.cache
nosetests.xml
coverage.xml
*.cover
*.py,cover
*.db
*.sqlite
```

```
# PyCharm
.idea/
```

```
# VS Code
.vscode/
```

```
# Environment variables
.env

# Logs
*.log

# Docker
# (Do NOT ignore docker-compose.yml or Dockerfile)
# docker-compose.yml
# Dockerfile

# Misc
*.swp
*.swo
*.swn
*.tmp
*.bak
*.orig
*.rej
*.sublime-workspace
*.sublime-project
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"""

A very small wrapper around the Ollama API that turns a piece of text into a concise summary.

The module exposes a single coroutine:

```
    async def summarize(text: str) -> str
```

It uses the `ollama` Python package (see requirements.txt) and expects the environment variable `OLLAMA\_MODEL` to be set. If the variable is missing, it defaults to "llama3". If the request fails, the function returns a short error message so that the bot can still reply with something useful.

"""

```
import os
import asyncio
from typing import Optional

import ollama
```

```
# Load the model name once at import time
OLLAMA_MODEL: str = os.getenv("OLLAMA_MODEL", "llama3")

async def summarize(text: str) -> str:
    """
    Return a short summary of *text* using the Ollama chat API.

    Parameters
    -----
    text : str
        The original message content to summarise.

    Returns
    -----
    str
        A concise summary. If the request fails, a short error string
        is returned instead.
    """
    # The request is performed in a threadâ??pool to avoid blocking the
    # event loop. The Ollama client is synchronous, so we wrap it
    # with asyncio.to_thread.
    try:
        response = await asyncio.to_thread(
            ollama.chat,
            model=OLLAMA_MODEL,
            messages=[
                {
                    "role": "system",
                    "content": (
                        "You are a helpful assistant that produces short "
                        "summaries of the given text. Keep the summary to "
                        "one or two sentences."
                    ),
                },
                {"role": "user", "content": text},
            ],
            temperature=0.2,
            max_tokens=60,
        )
        # The assistant's reply is in the 'message' field of the response.
        summary = response.get("message", {}).get("content", "").strip()
        return summary or "è!ç´?ã•šã••ã•¼ã•?ã??ã•šã•?ã•?ã??"
    except Exception:
        # Return a userâ??friendly message on failure.
        return "è!ç´?ã•šã••ã•¼ã•?ã??ã•šã•?ã•?ã??"
```

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Tags

1. AI
2. LLM
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Author

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