Modules

Agents

Agent types

Self ask with search

## Self ask with search

This walkthrough showcases the Self Ask With Search chain.

```
from langchain import OpenAI, SerpAPIWrapper
from langchain.agents import initialize_agent, Tool
from langchain.agents import AgentType
llm = OpenAI(temperature=0)
search = SerpAPIWrapper()
tools = [
    Tool(
        name="Intermediate Answer",
        func=search.run,
        description="useful for when you need to ask with search",
    )
1
self_ask_with_search = initialize_agent(
    tools, llm, agent=AgentType.SELF_ASK_WITH_SEARCH, verbose=True
self_ask_with_search.run(
    "What is the hometown of the reigning men's U.S. Open champion?"
)
```

## **API Reference:**

- initialize\_agent from langchain.agents
- Tool from langchain.agents
- AgentType from langchain.agents

```
> Entering new AgentExecutor chain...
Yes.
Follow up: Who is the reigning men's U.S. Open champion?
Intermediate answer: Carlos Alcaraz Garfia
Follow up: Where is Carlos Alcaraz Garfia from?
Intermediate answer: El Palmar, Spain
So the final answer is: El Palmar, Spain
```

> Finished chain.

'El Palmar, Spain'