

# Interoperating with Dynamic Languages

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# Overview



Why dynamic interop?

Getting started with IronPython

Getting scripting input from the user

Executing Python statements

Interacting with Python objects

Passing custom dynamic objects to Python



# Why Dynamic Interop?

Language  
features

Libraries and  
scripts

Scripting

**Not existing in C#**  
**Chained comparison**  
**operators**

**1 < age < 50**

**More elegantly solve the  
problem**

**Existing libraries**  
**Scripts**

**No .NET version exists**  
**Already written in  
company**

**Add user scripting to  
application**

**E.g. user entering  
business rules as  
expressions**



Allowing users to enter and execute arbitrary script/code may introduce security, data corruption, and other risks.



# Summary



Why dynamic interop?

Getting started with IronPython

IronPython NuGet package

`Python.CreateEngine()`

`SourceCodeKind.Expression`

`SourceCodeKind.SingleStatement`

Python tuple

`engine.CreateScriptSourceFromFile()`

Pass `HtmlElement` to Python script





# My Pluralsight Course List

<https://bit.ly/psjason>

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