

## ISXEVE - Accessing Planet Information from solarsystem datatype

```
function main()
{
    variable index:int Planets
    variable iterator PlanetsIterator
    variable iterator PlanetsByTypeIterator
    variable collection:int PlanetsByType
    variable int Counter = 1

    ; Using system Gulfonodi as test (Gulfonodi's ID is 30002384)
    Universe[30002384]:GetPlanetIDs[Planets]
    Planets:GetIterator[PlanetsIterator]
    Universe[30002384]:GetNumPlanetsByType[PlanetsByType]
    PlanetsByType:GetIterator[PlanetsByTypeIterator]

    if ${PlanetsIterator:First(exists)}
    {
        echo "[PI] The Gulfonodi System has ${Planets.Used} planets:"
        do
        {
            echo "[PI] - ${Counter}. ${PlanetsIterator.Value}:
${Universe[${PlanetsIterator.Value}].Name}"
            Counter:Inc
        }
        while ${PlanetsIterator:Next(exists)}
    }
    Counter:Set[1]

    if ${PlanetsByTypeIterator:First(exists)}
    {
        echo "[PI] The breakdown of planet types in the Gulfondi System are as follows:"
        do
        {
            echo "[PI] - ${Counter}. ${PlanetsByTypeIterator.Key}: ${PlanetsByTypeIterator.Value}"
            Counter:Inc
        }
        while ${PlanetsByTypeIterator:Next(exists)}
        ;;;
        ; Note: To get quantities by type, use ${PlanetsByType.Element["Barren"]}, for example.
        ;;;
    }
    Counter:Set[1]

    return
}
}
```