STELLAR SCALES of JUPITER

Properties that Musically Resonate with Other Planets within .5 percent.

1. **Self ODR – farthest distance from sun over closest**

1.1027683997

2. **Solar Day**

Mercury PLANET → 1.6617382375019436455`4.879394527830653,

3. **Year Length**

Venus PLANET → 1.2051637510544178951`7.698970004336017,

4. **Mass**

Mercury PLANET → 1.4038366734678536888`3.6643247449969305,

5. **Angular Momentum**

Uranus PLANET → 1.5, Saturn PLANET → 1.119,

6. **Radius**

Saturn PLANET → 1.204,

SOLAR DAY by Jupiter

4 PLanets with Resonance by Solar Day

Mercury PLANET → 1.661738237501943645`4.879394527830653,

Earth PLANET → 1.2089574944149688976`4.999522094492023,

Mars PLANET → 1.2421932340650051644`4.999914368434747,

Saturn PLANET → 1.0736227461224532466`4.698940283859885,

Venus PLANET → 1.1027048687549725411`4.979366545126723

Neptune is very close to minor 6 th with 1.623

```
In[]:= 2^FractionalPart[Log[2, EntityValue["Planet", "SolarDay", "EntityAssociation"] /
         Entity["Planet", "Jupiter"]["SolarDay"]]]
```

Out[]= ⟨| Mercury → 1.6617, Venus → 1.1027, Earth → 1.2090, Mars → 1.2422, Jupiter → 1.0000, Saturn → 1.0736, Uranus → 1.7368, Neptune → 1.6230 |⟩

```
In[]:= 2^FractionalPart[
         Log[2, Entity["MinorPlanet", "Pluto"]["SolarDay"] / Entity["Planet", "Jupiter"]["SolarDay"]]]
```

Out[]= 1.9306

```
In[]:= 2^FractionalPart[
         Log[2, Entity["MinorPlanet", "Eris"]["SolarDay"] / Entity["Planet", "Jupiter"]["SolarDay"]]]
```

Out[]= 1.30

```
In[]:= 2^FractionalPart[
         Log[2, Entity["Planet", "Jupiter"]["SolarDay"] / Entity["MinorPlanet", "Ceres"]["SolarDay"]]]
```

Out[]= 1.094

MASS by JUPITER

Mercury PLANET → 1.4038366734678536888`3.6643247449969305,

Saturn PLANET → 1.6699521425469759428`3.730969692056988,

Earth PLANET → 1.2415514970698172268`3.531907293713162,

PLUTO -> 1.1063

```
In[]:= 2^FractionalPart[
         Log[2, Entity["Planet", "Jupiter"]["Mass"] / EntityValue["Planet", "Mass", "EntityAssociation"]]]
```

Out[]= ⟨| Mercury → 1.404, Venus → 1.523, Earth → 1.242, Mars → 1.444, Jupiter → 1.000, Saturn → 1.670, Uranus → 1.367, Neptune → 1.158 |⟩

```
In[]:= 2^FractionalPart[
         Log[2, Entity["Planet", "Jupiter"]["Mass"]/Entity["MinorPlanet", "Ceres"]["Mass"]]]
Out[]= 1.91

In[]:= 2^FractionalPart[
         Log[2, Entity["Planet", "Jupiter"]["Mass"]/Entity["MinorPlanet", "Pluto"]["Mass"]]]
Out[]= 1.106

In[]:= 2^FractionalPart[
         Log[2, Entity["Planet", "Jupiter"]["Mass"]/Entity["MinorPlanet", "Eris"]["Mass"]]]
Out[]= 1.73

In[]:= ----------------------------------------------
```

YEAR LENGTH by JUPITER

Venus → **1.2051638,**

Earth → 1.4828011,

Saturn → 1.2411891,

Moon 1.2389

Uranus and Pluto are btw 2 and 3 × %

```
In[]:= 2^FractionalPart[Log[2, EntityValue["Planet", "OrbitPeriod", "EntityAssociation"]/
         Entity["Planet", "Jupiter"]["OrbitPeriod"]]]
Out[]= ⟨| Mercury → 0.6496961, Venus → 0.8297628, Earth → 0.6743993, Mars → 0.6342101,
         Jupiter → 1.0000000, Saturn → 1.2411891, Uranus → 1.7706224, Neptune → 1.7364565 |⟩

In[]:= 2^FractionalPart[Log[2, Entity["Planet", "Jupiter"]["OrbitPeriod"]/
         EntityValue["Planet", "OrbitPeriod", "EntityAssociation"]]]
Out[]= ⟨| Mercury → 1.539181, Venus → 1.2051638, Earth → 1.4828011, Mars → 1.5767645,
         Jupiter → 1.0000000, Saturn → 0.8056790, Uranus → 0.5647732, Neptune → 0.5758854 |⟩

In[]:= 2^FractionalPart[Log[2,
         Entity["MinorPlanet", "Eris"]["OrbitPeriod"]/Entity["Planet", "Jupiter"]["OrbitPeriod"]]]
Out[]= 1.4671
```

In[]:=
```
2^FractionalPart[Log[2,
   Entity["MinorPlanet", "Pluto"]["OrbitPeriod"]/Entity["Planet", "Jupiter"]["OrbitPeriod"]]]
```

Out[]= 1.3062078

In[]:=
```
2^FractionalPart[Log[2,
   Entity["Planet", "Jupiter"]["OrbitPeriod"]/Entity["MinorPlanet", "Ceres"]["OrbitPeriod"]]]
```

Out[]= 1.2893601

In[]:=
```
2^FractionalPart[
  Log[2, Entity["Planet", "Jupiter"]["OrbitPeriod"]/ Moon PLANETARY MOON ["OrbitPeriod"]]]
```

Out[]= 1.2389

Jupiter Ang Mom

Uranus 1.5, Saturn 1.119, Ceres 1.41

Merc 1.36, Earth Eris 1.17 at 3 × %

In[]:=
```
MomentOfInertia

2^FractionalPart[Log[2, Entity["Planet", "Jupiter"]["MomentOfInertia"]/
    EntityValue["Planet", "MomentOfInertia", "EntityAssociation"]]]
```

Out[]= MomentOfInertia

Out[]= ⟨| Mercury → 1.7, Venus → 1.2, Earth → 1.79, Mars → 1.67,
Jupiter → 1.00, Saturn → 1.46, Uranus → 1.47, Neptune → 1.0 |⟩

MAKE ANG MOMENTUM LIST

```
angV = 2 / 5 * Entity["Planet", "Venus"]["Mass"] *
  Entity["Planet", "Venus"]["Radius"]^2 * Entity["Planet", "Venus"]["SolarDay"] * 2 * π
```

Out[•]= $2.02 \times 10^{34}\ \mathrm{kg\,mi^2 days}$

```
angM = 2 / 5 * Entity["Planet", "Mercury"]["Mass"] *
  Entity["Planet", "Mercury"]["Radius"]^2 * Entity["Planet", "Mercury"]["SolarDay"] * 2 * π
```

Out[•]= $3.35 \times 10^{32}\ \mathrm{kg\,mi^2 days}$

```
angE = 2 / 5 * Entity["Planet", "Earth"]["Mass"] *
  Entity["Planet", "Earth"]["Radius"]^2 * Entity["Planet", "Earth"]["SolarDay"] * 2 * π
```

Out[•]= $5.65 \times 10^{33}\ \mathrm{kg\,mi^2 h}$

```
angMa = 2 / 5 * Entity["Planet", "Mars"]["Mass"] *
  Entity["Planet", "Mars"]["Radius"]^2 * Entity["Planet", "Mars"]["SolarDay"] * 2 * π
```

Out[•]= $1.764 \times 10^{32}\ \mathrm{kg\,mi^2 h}$

```
angC = 2 / 5 * Entity["MinorPlanet", "Ceres"]["Mass"] *
  Entity["MinorPlanet", "Ceres"]["Radius"]^2 * Entity["MinorPlanet", "Ceres"]["SolarDay"] * 2 * π
```

Out[•]= $1.84 \times 10^{27}\ \mathrm{kg\,mi^2 h}$

```
angJ = 2 / 5 * Entity["Planet", "Jupiter"]["Mass"] *
  Entity["Planet", "Jupiter"]["Radius"]^2 * Entity["Planet", "Jupiter"]["SolarDay"] * 2 * π
```

Out[•]= $8.94 \times 10^{37}\ \mathrm{kg\,mi^2 h}$

```
angS = 2 / 5 * Entity["Planet", "Saturn"]["Mass"] *
  Entity["Planet", "Saturn"]["Radius"]^2 * Entity["Planet", "Saturn"]["SolarDay"] * 2 * π
```

Out[•]= $1.998 \times 10^{37}\ \mathrm{kg\,mi^2 h}$

```
angU = 2 / 5 * Entity["Planet", "Uranus"]["Mass"] *
  Entity["Planet", "Uranus"]["Radius"]^2 * Entity["Planet", "Uranus"]["SolarDay"] * 2 * π
```

Out[•]= $9.34 \times 10^{35}\ \mathrm{kg\,mi^2 h}$

```
angN = 2 / 5 * Entity["Planet", "Neptune"]["Mass"] *
  Entity["Planet", "Neptune"]["Radius"]^2 * Entity["Planet", "Neptune"]["SolarDay"] * 2 * π
```

Out[•]= $9.7 \times 10^{35}\ \mathrm{kg\,mi^2 h}$

In[]:=
```
angP = 2 / 5 * Entity["MinorPlanet", "Pluto"]["Mass"] *
  Entity["MinorPlanet", "Pluto"]["Radius"]^2 * Entity["MinorPlanet", "Pluto"]["SolarDay"] * 2 * π
```

Out[]= $1.149 \times 10^{29}\ \text{kg mi}^2\text{days}$

In[]:=
```
angE = 2 / 5 * Entity["MinorPlanet", "Eris"]["Mass"] *
  Entity["MinorPlanet", "Eris"]["Radius"]^2 * Entity["MinorPlanet", "Eris"]["SolarDay"] * 2 * π
```

Out[]= $5.7 \times 10^{29}\ \text{kg mi}^2\text{h}$

Venus Ang Mom
Neptune 1.00 !!!!!
Merc 1.88, Mars 1.34, Pluto 1.34

In[]:=
```
2^FractionalPart[Log[2, angV / angMom]]
```

Out[]= {1.88, 1.00, 1.63, 1.34, 1.96, 0.694, 0.776, 0.519, 1.00, 1.34, 1.63}

In[]:=
```
2^FractionalPart[Log[2, angMom / angV]]
```

Out[]= {0.53, 1.00, 0.61, 0.745, 0.51, 1.44, 1.29, 1.93, 1.00, 0.746, 0.61}

In[]:=
```
angMom = List[angM, angV, angE, angMa, angC, angJ, angS, angU, angN, angP, angE]
```

Out[]= $\{3.35 \times 10^{32}\ \text{kg mi}^2\text{days},\ 2.02 \times 10^{34}\ \text{kg mi}^2\text{days},\ 5.7 \times 10^{29}\ \text{kg mi}^2\text{h},\ 1.764 \times 10^{32}\ \text{kg mi}^2\text{h},\ 1.84 \times 10^{27}\ \text{kg mi}^2\text{h},\ 8.94 \times 10^{37}\ \text{kg mi}^2\text{h},\ 1.998 \times 10^{37}\ \text{kg mi}^2\text{h},\ 9.34 \times 10^{35}\ \text{kg mi}^2\text{h},\ 9.7 \times 10^{35}\ \text{kg mi}^2\text{h},\ 1.149 \times 10^{29}\ \text{kg mi}^2\text{days},\ 5.7 \times 10^{29}\ \text{kg mi}^2\text{h}\}$

Mercury Angular Momentum

Out[]= Angular Mercury Momentum

Hits
Venus 1.88, Neptune 1.88, Saturn 1.21, Uranus 1.81, Ceres 1.04
3 × %
Jupiter 1.36 , Mars 1.43, Pluto 1.43

Earth and Eris have 1.73 !!!!!

2^FractionalPart[Log[2, angMom / angM]]

Out[]= {1.00, 1.88, 0.58, 0.70, 0.96, 1.36, 1.21, 1.81, 1.88, 0.70, 0.58}

In[]:=
```
2^FractionalPart[Log[2, angM / angMom]]
```

Out[]= {1.00, 0.53, 1.73, 1.43, 1.04, 0.74, 0.83, 0.55, 0.53, 1.43, 1.73}

Earth Ang Mom

Eris 1.00!!!!!!

Ceres 1.2, Mars 1.21, Pluto 1.21, Saturn 1.05

```
In[•]:= 2^FractionalPart[Log[2, angMom / angE]]
Out[•]= {1.73, 1.63, 1.00, 1.21, 0.83, 1.17, 1.05, 1.57, 1.63, 1.21, 1.00}

In[•]:= 2^FractionalPart[Log[2, angE / angMom]]
Out[•]= {0.58, 0.61, 1.00, 0.82, 1.20, 0.85, 0.95, 0.64, 0.61, 0.82, 1.00}
```

Mars Ang Mom

Pluto 2.00 !!!!

Earth 1.21, Eris 1.21, Venus 1.34, Neptune 1.34

```
In[•]:= 2^FractionalPart[Log[2, angMa / angMom]]
Out[•]= {0.70, 0.745, 1.21, 1.000, 1.46, 0.517, 0.579, 0.773, 0.74, 2.000, 1.21}

In[•]:= 2^FractionalPart[Log[2, angMom / angMa]]
Out[•]= {1.43, 1.34, 0.82, 1.000, 0.68, 1.934, 1.728, 1.293, 1.34, 0.500, 0.82}
```

Ceres Ang Mom

Earth n Eris 1.2, Jupiter 1.41, Saturn 1.26, Uranus 1.89, Mercury 1.04

```
In[•]:= 2^FractionalPart[Log[2, angC / angMom]]
Out[•]= {0.96, 0.51, 0.83, 0.68, 1.00, 0.71, 0.79, 0.53, 0.51, 0.68, 0.83}

In[•]:= 2^FractionalPart[Log[2, angMom / angC]]
Out[•]= {1.04, 1.96, 1.20, 1.46, 1.00, 1.41, 1.26, 1.89, 1.96, 1.46, 1.20}
```

Jupiter Ang Mom

Uranus 1.5, Saturn 1.119, Ceres 1.41

Merc 1.36 , Earth Eris 1.17 at 3%

In[]:= **2^FractionalPart[Log[2, angJ / angMom]]**

Out[]= {1.36, 1.44, 1.17, 1.934, 1.41, 1.000, 1.119, 1.50, 1.44, 1.934, 1.17}

Saturn Ang Mom

Jupiter 1.119, Merc 1.21, Earth n Eris 1.05, Ceres 1.26, Uranus 1.34

In[]:= **2^FractionalPart[Log[2, angS / angMom]]**

Out[]= {1.21, 1.29, 1.05, 1.728, 1.26, 0.893, 1.000, 1.34, 1.29, 1.727, 1.05}

In[]:= **2^FractionalPart[Log[2, angMom / angS]]**

Out[]= {0.83, 0.776, 0.95, 0.579, 0.79, 1.119, 1.000, 0.748, 0.78, 0.579, 0.95}

Uranus ang Mom

Jupuiter 1.50, Merc 1.81, Ceres 1.89, Saturn 1.34, Neptune 1.04

In[]:= **2^FractionalPart[Log[2, angU / angMom]]**

Out[]= {1.81, 1.93, 1.57, 1.293, 1.89, 0.668, 0.748, 1.00, 0.96, 1.293, 1.57}

In[]:= **2^FractionalPart[Log[2, angMom / angU]]**

Out[]= {0.55, 0.519, 0.64, 0.773, 0.53, 1.50, 1.34, 1.00, 1.04, 0.774, 0.64}

Neptune Ang Momentum
Venus 1.00 ! ! ! !
Mercury 1.88, Mars n Pluto 1.34, Uranus 1.04

2^FractionalPart[Log[2, angN / angMom]]

Out[]= Ang Momentum Neptune

Out[]= {1.88, 1.00, 1.63, 1.34, 1.96, 0.69, 0.78, 1.04, 1.00, 1.34, 1.63}

In[]:= **2^FractionalPart[Log[2, angMom / angN]]**

Out[]= {0.53, 1.00, 0.61, 0.74, 0.51, 1.44, 1.29, 0.96, 1.00, 0.74, 0.61}

Pluto Ang Momentum

Mars 2.00 ! ! !
Earth n Eris 1.21, Venus n Neptune 1.34

In[]:=
```
2^FractionalPart[Log[2, angP / angMom]]
```
Out[]= {0.70, 0.746, 1.21, 0.500, 1.46, 0.517, 0.579, 0.774, 0.74, 1.000, 1.21}

In[]:=
```
2^FractionalPart[Log[2, angMom / angP]]
```
Out[]= {1.43, 1.34, 0.82, 2.000, 0.68, 1.934, 1.727, 1.293, 1.34, 1.000, 0.82}

Eris Ang Momentum

Earth 1.000 !
Ceres 1.20
Mars n Pluto 1.21, Saturn 1.05

In[]:=
```
2^FractionalPart[Log[2, angMom / angE]]
```
Out[]= {1.73, 1.63, 1.00, 1.21, 0.83, 1.17, 1.05, 1.57, 1.63, 1.21, 1.00}

In[]:=
```
2^FractionalPart[Log[2, angE / angMom]]
```
Out[]= {0.58, 0.61, 1.00, 0.82, 1.20, 0.85, 0.95, 0.64, 0.61, 0.82, 1.00}

Radius by Jupiter

Saturn 1.204,

Mercury 1.24, Ceres 1.61, Uranus 1.048 , Mars 1.785

almost Pluto 1.271 a little over 2 × % though it rounds down

In[]:=
```
2^FractionalPart[Log[2,
   Entity["Planet", "Venus"]["Radius"] / EntityValue["Planet", "Radius", "EntityAssociation"]]]
```
Out[]= ⟨| Mercury → 1.24, Venus → 1.000, Earth → 0.950, Mars → 1.785,
Jupiter → 0.692, Saturn → 0.830, Uranus → 0.954, Neptune → 0.98 |⟩

In[]:=
```
2^FractionalPart[Log[2,
   EntityValue["Planet", "Radius", "EntityAssociation"] / Entity["Planet", "Venus"]["Radius"]]]
```
Out[]= ⟨| Mercury → 0.806, Venus → 1.000, Earth → 1.053, Mars → 0.560,
Jupiter → 1.445, Saturn → 1.204, Uranus → 1.048, Neptune → 1.02 |⟩

In[]:=
```
2^FractionalPart[
  Log[2, Entity["Planet", "Venus"]["Radius"] / Entity["MinorPlanet", "Pluto"]["Radius"]]]
```
Out[]= 1.271

```
In[ ]:= 2^FractionalPart[
          Log[2, Entity["Planet", "Venus"]["Radius"]/Entity["MinorPlanet", "Eris"]["Radius"]]]
Out[ ]= 1.301

In[ ]:= 2^FractionalPart[
          Log[2, Entity["Planet", "Venus"]["Radius"]/Entity["MinorPlanet", "Ceres"]["Radius"]]]
Out[ ]= 1.61
```