

The Angular Momentum Problem with Barycenters in Stellar Metamorphosis

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Abstract: A serious problem is brought to light concerning establishment's acceptance of stars not losing most of their mass and their acceptance of the permanence of orbits. This is due to the angular momentum of objects in the outer solar system being way too high to maintain a stable barycenter given stars lose considerable mass as they evolve.

Jupiter contains the majority of the angular momentum of the solar system, so if the Sun continues to lose mass and moves into red dwarf stages of stellar evolution, then brown dwarf stages, the barycenter (gravitational center of orbit) between Jupiter and the Sun will change. The objects therefore that orbit the Sun only will move to take up their position as objects that orbit two objects. Since mass is lost as stars evolve, and Jupiter's mass loss will be much slower than the Sun's given it is no longer flaring or experiencing large CME's, and the angular momentum of solar system bodies is conserved, it means the center of mass of the solar system will eventually be near the orbit of Mars. This means all the inner and outer objects will change orbits to conserve their high angular momentum and some will even exit the solar system entirely. It would be like taking a car too fast into a turn, the traction is too low and center of gravity too high, so it keeps going straight and thus flipping instead of going into the turn. (This is why Uranus axis is off, it was ejected from another system).

When the Sun is closer to the mass of Jupiter, the center of mass of the solar system will be way off, meaning the inner objects will get pulled in the direction of Jupiter or move closer to the Sun. Of course this means Mercury and Venus are going to get much closer to the Sun as it cools and shrinks, (the sun will lose its directional galactic angular momentum and that angular momentum will be transferred to the innermost objects as much closer orbits, basically Mercury and Venus's speeds will increase) Earth will move a little further from the Sun as some of its angular momentum is transferred to Jupiter), and Mars will be ejected completely out of the solar system (it will be slingshot out of the system due to Jupiter's increase of angular momentum from Earth moving a little further out). Elon Musk should keep this in mind. Mars will become a lot colder than it already is in the future. It is no future home for humans. It is a barren wasteland already, now it will be a close to absolute zero wasteland, it will be a good place to test superconductivity, but that's about it. No farmland or manifest destiny there! That is unless Mr. Musk wants to place bets on how close Mars will get to another parent star in a few millions years after it is slung out of the solar system.

Of course this is all conjecture, but it should be made in light of the Sun's actual evolutionary path being towards a mass loss one, due to the mass loss principle of stellar evolution. It will become an orange dwarf, then a red dwarf, then a brown dwarf. It and Jupiter will be a double evolving star system, with Uranus as an ocean world and Neptune being a pre-ocean world, and Saturn being a gray dwarf. It will be a strange looking system in the far future. This is all given no other objects are adopted too, so there's that.