## One astronomical interpretation for two millenary myth, phoenix and unicorn

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#### Abstract

Since the periods of the revolution of the planets Jupiter and Saturn around the Sun amount respectively to 11.862 years and to 29.458 years, their orbits are ellipses with very little eccentricity and their orbital planes are only lightly tilted with respect to the Earth's orbital plane (ecliptic), conjunctions of the two planets take place on average every Tss $=\mathrm{T}_{\mathrm{s}}$ * $\mathrm{T}_{\mathrm{s}} /\left(\mathrm{Ts}_{\mathrm{s}}-\mathrm{T}_{\mathrm{s}}\right)=19.859$ years, 7253 days.

While the heliocentric phenomenon (that is the phenomenon seen from the Sun) is simply a quick overtaking of Saturn by the faster Jupiter, the geocentric conjunction (i.e. the conjunction seen from the Earth) can assume quite different appearances and durations. According to the position of our planet on its orbit, geocentric appearance of the J-S conjunction can be that of multiple (triple or double) alignments in a time span of seven-eight months or that of a single, quick J-S alignment.

In a contribution presented on Sept. 23rd, 2006, at the $6^{\circ}$ annual Meeting of the Italian Society of Archaeo-astronomy the undersigned scholar demonstrated - by collecting all dated "appearances" of the phoenix bird in ancient classical works and putting them (by means of astronomical software) in connection with contemporaneous occurrences of multiple J-S conjunctions - that the phoenix was the allegorical image of this astronomical event.

By means of a similar method it has been possibile to demonstrate ${ }^{1}$ that the unicorn was in ancient times the allegorical symbol for single J-S conjunctions in which the residual, minimal separation angle between Jupiter and Saturn was low or very low (about 20' on average).

Conclusion is that the phoenix and the unicorn show a clear and close relationship. It was perhaps for this reason that both figures were alternatively assumed as symbols of Christ. At least until to the Council of Trent (1545-1563), when the religious iconographical use of the unicorn was officially forbidden.


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[^0]:    ${ }^{1}$ What I did on Sept. $29^{\text {th }}$, 2007 at the $7^{\circ}$ Annual Meeting of the Ital. Soc. of Archaeo-astronomy, hold in Rome (Sept. 28-29, 2007).

