1035-01-496 **Toke Lindegaard Knudsen*** (toke_knudsen@brown.edu), Department of the History of Mathematics, Brown University, Box 1900, Providence, RI 02912. *Mathematics and Mathematical Astronomy in Ancient India.*

Since ancient times, both mathematics and mathematical astronomy, which belong to the same general grouping of Sanskrit knowledge systems, have been a subject of study in India. While Sanskrit texts on these topics were often written by the same people and share many mathematical methods, they differ in their presentation, as well in the topics treated. The links between scholarly mathematics and scholarly mathematical astronomy in India, e.g., how much of the contents of the Sanskrit mathematical treatises are put into play in mathematical astronomy, is a question that has not been widely investigated.

With an eye to the relationship with the Indian mathematical treatises and the greater Hindu tradition, this talk will take a look at the contents of mathematical astronomy in ancient and medieval India. (Received September 09, 2007)