



THE HEAVENLY HARP.

To know the constellations and the principal objects of interest in them, all the help that is really needed is a star-map. With that and a few hours study on a few clear evenings one can easily get such a general knowledge of the geography of the heavens as will add largely to his general stock of pleasure and will enable him to read books and articles on astronomical subjects with more intelligence and far more enjoyment.

Many of the readers of the REVIEW have already scraped an acquaintance of this sort with our celestial neighbors, and we hope many more will be helped to do the same by the maps which we begin again to publish in this issue. If something better than our maps is wanted, a good star-atlas is easy to get and does not cost much. Proctor's smaller one costs five shillings, and the English edition of Klein's seven and sixpence—the New York edition costs \$2.50. Larger and fuller ones are better, of course—and cost more—but these are quite sufficiently good for all the purposes of the amateur star-gazer.

Some of our readers would probably like to know a little more about some of the stars than can be gathered from looking at them on a map or in the sky. To supply a supposed want of this kind, and at the same time to put our readers in the way of

making a small collection of some of the most interesting of all the sorts of celestial objects within the reach of the naked eye or of such a small glass—spy, opera, marine or field—as almost everybody nowadays can buy or borrow; with these objects in view we propose to publish from time to time a series of articles of which the following one on Lyra is the first, and the general character of which will probably be pretty much like it.

Lyra is only a small constellation, but it is interesting in several ways. The lyre painted over it on celestial globes is Orpheus' or Apollo's or Mercury's or Jubal's or somebody else's. That's an interesting thing to those who take an interest in such things. Then the constellation contains one of the brightest stars in the heavens, a star which, in the dim and distant future, will be the pole star. It contains also one of the most famous double stars, one of the most remarkable variable stars, and one of the most curious nebulas.

For naked eye and small glass observation the chief objects of interest are Alpha, Beta, Gamma, Delta, Epsilon and Zeta. On our map Alpha is the eight-point star, Beta and Gamma the four-point ones. Beta on the right, Epsilon and Zeta are the two to the left of Alpha, Epsilon the upper one. Delta is next left of Zeta. Between Beta and Gamma is 57 Messier, an annular nebula. Left of Delta is Iota, above that Theta, and then Eta. At the top is R. To the right of Alpha is Mu, below Mu is Kappa. The one above Mu and the one at the bottom I don't know. Ditto for the one at the lower left boundary line, unless it is meant for 56 Messier.

In our latitude Lyra is above the horizon for nineteen hours out of the twenty-four. Therefore at any given hour—say 9 p. m. it may be seen somewhere in the sky on every night for about nine months in the year. (Weather permitting, of course—this is always understood in such matters.) It rises at 9 p. m. towards the end of March, and sets at 9 p. m. at the beginning of January. If 9 or thereabout is your star-gazing hour you will know from this in what months to look for Lyra, and whether to look towards the north-east, the zenith, or the north-west. In November evenings it will be coming down from the zenith towards the north-west. If you do your star-gazing at odd times anywhere between sunset and midnight, you may pay your respects to Lyra on every night in the year, for it rises at midnight on the 1st of February and sets with the sun on the 1st of March. Early in February you may see it set in the north-west after sunset and rise again in the north-east about midnight.