broadly elliptical, compressed dorsoventrally and its basal three-fourths is formed by the first segment. The spurs of the median and hind legs are not pectinate. Species in the State are usually dark in color, being yellowish or reddish brown or black. Most of them have the head, thorax and pedicel sculptured and opaque. The gaster is always smooth and shining.

Apparently none of the species is at all common in the State. Those colonies which are present are difficult to find because of the diminutive size of the workers and the rather secluded locations of the nests. Colonies may be found in cavities in the soil beneath stones, in decaying wood and in the dry hollow stems of plants. Nests were found for the most part in rather moist areas, and they are undoubtedly very scarce on the sagebrush plains.

## KEY TO THE SPECIES OF LEPTOTHORAX IN UTAH

1. Antennae 11-segmented 2   Antennae 12-segmented 5   2. Thorax with a faint but distinct mesoepinotal impression 3
Thorax without a meoepinotal impression; (upper surface of head and gaster,
with exception of posterior edges of gastric segments, dark brown; thorax
yellow or yellowish brown)rugatulus Emery
3. Tibiae and antennal scapes without clavate hairs4
Tibiae and antennal scapes with short, erect, clavate hairs; (body bright testaceo- ferruginous, gaster and middle of frons infuscatedhirticornis Emery
4. Body dark brown, almost black
Body color much lighteracervorum canadensis var. yankee Emery
5. Head very largely smooth and shining; epinotal spines very small, tooth-like,
scarcely as long as the space between their bases; body yellow, in some speci-
mens the vertex, antennal club and dorsum of gaster lightly infuscated
nitens Emery
Head subopaque, with a satiny luster; epinotal spines robust, distinctly shorter than the spaces between their bases; body dark reddish brown, ventral portions of head, thorax and pedicel yellowishnevadensis Wheeler

## Leptothorax rugatulus Emery

Distribution.—Delle (Knowlton); Clover, Park Valley in Box Elder Co., Fishers Pass in Tooele Co. (Knowlton and M. J. Janes); White Valley in Millard Co. (Fautin).

Nests are found in the soil beneath stones in rather moist areas. Colonies are small.

## Leptothorax acervorum candensis Provancher

Distribution.—Salt Lake Co. (Chamberlin); S. Fork of Big Cottonwood Canyon, Little Cottonwood Canyon—both in Salt Lake Co. (Grundmann and Fox).

Colonies nest in or beneath decaying wood. Nests were found in decaying pine logs, in a conifer stump and in holes in dead conifers. Colonies are generally small, but some may consist of a hundred or more workers.

## Leptothorax acervorum canadensis var. yankee Emery

Differs from the typical canadensis in its lighter coloration and somewhat longer epinotal spines. The sculpturing is finer and less rugose than in the typical form.