

more anterior caudals the height is about equal to the length of the centrum. In most of the spines the upper anterior angle is produced slightly forward giving the anterior face a concave outline in lateral aspect. In passing back, in the tail, the spines decrease in height and, concurrent with the proportionate lengthening of the centra, add to their antero-posterior depth. This increase in depth is attained principally at the distal end where the posterior angulation is produced backward beyond the line of the end of the centrum causing the narrow hinder edge of the spine to face obliquely downward.

Concurrent with the lengthening of the centra, and the antero-posterior extension of the neural spines and chevrons there is a striking prolongation of the prezygapophysial processes. Up to the eleventh caudal vertebra each prezygapophysis (facing inward and upward) is at the end of the process, but at the twelfth the process begins to extend forward beyond the zygapophysial facet and in the vertebrae that follows the prolongation is rapidly increased, each process extending far forward parallel with the neural spine of the preceding vertebra. In the twenty-eighth vertebra the length of the prezygapophysial process is nearly equal to that of the centrum. When the process extends beyond the prezygapophysis the latter faces directly inward and appears on the inner side of the process as a small slightly elevated, oval surface.

The postzygapophyses in the anterior caudals face outward and downward, and occur at the base of the neural spine posteriorly. In following backward the neural spines decrease in height and up to the twentieth vertebra still rise above the level of the postzygapophyses. In the vertebrae that follow, however, the reduced neural spine, sunk to the level of the postzygapophyses, combines with the latter to form a stout backwardly directed, centrally placed process which interlocks with the pair of prezygapophysial processes of the succeeding vertebra. In the eighteenth caudal there is a slight prolongation of the bone backward beyond the postzygapophysis on each side of and past the backward termination of the neural spine. This double prolongation, which increases to some extent in the vertebrae following the eighteenth, has the appearance, when viewed from above, of a bifurcation of the central, composite postzygapophysial process. The postzygapophysial articulating facet on each side of this process faces directly outward.

In the anterior caudal vertebrae the prezygapophysial processes are directed upward at an angle of about 35 degrees, but in those that follow they gradually become less inclined. These processes are laterally compressed in a moderate degree, the greater diameter being nearly vertical, in which respect they differ from the much flattened corresponding processes of *Ornithomimus*, already referred to, with a greater transverse diameter sometimes nearly horizontal (Figure 17). The