

- 1) the absence of typically Pliocene genera;
- 2) the presence of characteristically Middle and Late Pleistocene genera;
- 3) the presence of certain genera that survived from the Hemphillian but which did not live past the Blancan;
- 4) the presence of certain genera that were limited to the Blancan; and
- 5) the absence of certain genera that did not make their appearance until after the close of the Blancan.

Each of the above criteria may be examined with regard to the Haile XV A fauna:

- 1) There are no typically Hemphillian genera represented in Haile XV A. *Kraglievichia* may be of Pliocene age in South America, but it is Blancan or later in North America. It should be pointed out here that such negative evidence is never conclusive and is particularly dangerous with regard to the Haile XV A fauna. The small number of taxa found probably indicates that the specimens collected represent only a small part of the overall fauna.
- 2) Several genera that range into the Middle and Late Pleistocene appear in this fauna; such taxa include *Odocoileus*, *Mylohyus*, *Smilodon*, and *Sigmodon*.
- 3) Of the genera that survived the Hemphillian but not the Blancan only *Nannippus* is definitely present. The presence in the fauna of a gomphotheriid may also fit this category, despite the fact that the specimen cannot be definitely assigned to a genus.
- 4) Only one subgenus, *Dolichohippus* (genus *Equus*), in Haile XV A is restricted to the Blancan in North America. The species *Sigmodon medius*, *Nannippus phlegon*, and *Equus (Dolichohippus) simplicidens* are wholly restricted to the Blancan and are widespread through most of North America.
- 5) The genera *Dasypus* and *Mylohyus*, which previously were thought to have appeared after the close of the Blancan, are present in Haile XV A. In view of the peculiar ecological and geographic features of the Haile XV A fauna, these age extensions are not unexpected and do not affect the hypothesis of an older age suggested by the weight of other evidence. In each case the species is more primitive than those occurring in younger faunas.

The weight of the mammalian faunal evidence (see Table 21), particularly the presence of *Nannippus*, *Equus (Dolichohippus)*, and *Sigmodon medius*, points conclusively to a Blancan age. A more refined correlation of the Haile XV A fauna with other North American Blancan faunas (*i.e.* outside of Florida) is not feasible at present because of the geographic distances and ecological differences. Most Blancan faunas are located in western North America, but none, other than those in Florida, are known from the Gulf Coastal Plain. Consequently, the lack of a more detailed faunal comparison need not imply a great difference in time. The absence of *Kraglievichia* and *Dasypus* from Blancan sites elsewhere in North America more likely results from geographic rather than temporal differences. Conversely, a closer similarity to other Blancan faunas in Florida (*e.g.* Santa Fe I) does not indicate a close temporal correlation. Although definite similarities exist between the Haile XV A and Santa Fe I faunas, enough differences are present to indicate a differ-