

TABLE 1. DATA MATRIX OF MORPHOLOGICAL CHARACTERISTICS FOR SPECIES OF *ACANTHOMYRMEX* AND TWO HYPOTHETICAL OUTGROUPS.†

Taxon	Character																	
	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
OUTGROUP																		
MYRMECININI	0-1	?	?	?	?	?	?	?	?	?	?	?	?	?	?	?	?	?
TETHEPA	1-2	?	0	?	?	?	?	?	?	1	?	?	?	?	?	1	?	0
LUCIOLAE GROUP																		
<i>A. basispinosus</i>	2	0	1	1	1	0	0	0	0	1	0	2	1	1	P	P	1	1
<i>A. crassispina</i>	1	0	P	0	0	0	1	1	2	P	1	1	0	0	0	0	0	1
<i>A. dusun</i>	?	0	?	?	0	0	?	0	?	1	1	1	?	1	1	?	?	?
<i>A. ferox</i>	0	0	0	1	P	1	P	0	0	1	0	0	0	1	0	0	0	0
<i>A. laevis</i>	0	?	0	?	?	?	1	?	0	?	?	?	0	?	0	0	0	0
<i>A. luciulae</i>	2	0	0	1	1	1	0	0	1	1	0	0	0	1	0	0	P	1
NOTABILIS GROUP																		
<i>A. careoscribis</i>	1	?	0	0	?	?	1	?	1	?	?	?	0	?	1	0	P	1
<i>A. concavus</i>	2	?	1	0	?	?	P	?	2	?	?	?	0	?	1	1	1	0
<i>A. foveolatus</i>	?	1	?	?	0	0	?	1	?	0	P	2	?	0	1	?	?	?
<i>A. mindanao</i>	1	1	1	0	0	0	1	0	1	0	1	2	0	1	1	1	0	P
<i>A. notabilis</i>	0	1	0	0	1	0	P	0	0-1	P	P	2	1	1	P	0	1	0

† In the table “?” refers to missing data and “P” refers to a polymorphic condition, or an intermediate condition, as discussed in the text. Character numbers refer to the characters that follow: 1. minor head shape; 2. major head shape; 3. minor greatest head width; 4. minor cephalic sculpture; 5. major foveate sculpture; 6. major rugose sculpture; 7. minor pilosity height; 8. major pilosity density; 9. CI (minors); 10. CI (majors); 11. cephalic hollow; 12. darkly pigmented medial streak; 13. frontal sulcus (minors); 14. frontal sulcus (majors); 15. clypeal index; 16. medial clypeal lobes; 17. lateral clypeal hairs; 18. clypeal rugae; 19. medial projection; 20. SI; 21. funicular index; 22. propodeal spine length; 23. pronotal spine length; 24. pronotal angle; 25. propodeal declivity; 26. propodeal spiracle diameter; 27. petiolar spines; 28. PWI; 29. subpetiolar declivity; 30. anterior petiolar peduncle length; 31. petiolar index; 32. lateral petiolar hair; 33. sublateral petiolar hair; 34. postpetiole narrowness; 35. postpetiole node; 36. postpetiole pilosity; 37. gaster pilosity; 38. femur concavity; 39. femur pilosity; 40. FLI; 41. FWI; 42. pronotal spine pilosity; 43. hypostomal teeth; 44. ventral mandible tooth.

were chosen to cleanly separate the maximum number of species; species were considered polymorphic when the values for a numerical character were spread on either side of these limits, or when the species was known from only the holotype and the value for that specimen was near to the limit. As more *Acanthomyrmex* material becomes available, it will become easier to evaluate characters for their usefulness in phylogenetic studies.

OUTGROUPS

The affinities of *Acanthomyrmex* are uncertain. Emery (1922) placed the genus in a subtribe of the Myrmecini along with *Pristomyrmex*, *Myrmecina* and *Dacryon*, because in these genera the lateral portions of the clypeus form only a

thin transverse ridge anterior to the antennal fossae (Fig. 1). In other myrmecine genera the clypeus is thicker and wider laterally. However, he was unable to provide any certain characters which uniquely define the Myrmecini as a whole. Kugler (1978) found that the morphology of the sting apparatus “does not support the unity of the Myrmecini,” while Wheeler and Wheeler (1954) found for larval characters that “each of the five genera studied might as well be in a different tribe,” and later found considerable differences between the larvae of *Acanthomyrmex ferox* and *A. notabilis* (Wheeler and Wheeler, 1977, 1983, and in preparation).

However, *Pristomyrmex* and *Myrmecina* show a number of apparent synapo-