



Cytological Studies of Some *Vigna* (L.) Walp. Species

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ABSTRACT Cytological studies were carried out on twenty-five accessions of six species of *Vigna* in order to assess their genetic relationships. The accessions composed of 6 accessions of *V. unguiculata*, ten accessions of *V. vexillata*, four accessions of *V. luteola*, one accession of *V. ambacensis*, two accessions of *V. oblongifolia*, and two accessions of *V. racemosa*. Somatic chromosome counts of $2n=22$ were made for all the *Vigna* accessions studied and meiosis was observed to be regular in all the accessions with formation of eleven bivalents. The pollen studies revealed that all the accessions produced highly fertile pollen grains, which is the direct effect of regular meiosis observed in all the accessions. The mitotic metaphase chromosomes are very small and are largely metacentrics or submetacentrics. The study indicated that the karyotype number would not itself contribute to genetic incompatibility in interspecific crosses.