

Assessment of international cocoa accessions (*Theobroma cacao* L.) for pod filling and graining in Côte d'Ivoire

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1 ABSTRACT

This article deals with an assessment of 15 international cocoa accessions for pods filling. The objective of this study is to identify within the CNRA cocoa collection high-performance genotypes for agronomic traits of interest. Fifteen (15) cocoa accessions introduced from the Reading International Quarantine Center were characterized agromorphologically using 8 descriptive agronomic parameters of pods and beans following a complete randomized block experimental design with 2 repetitions. The results indicate that accessions EET95, UF273 and Playa Alta 2presented the best pod fillings with a high number of beans (respectively 48.28; 40.90; 40.83 beans) and high weights of fresh beans per pod (152.59g; 244.23g; 154.54g). Concerning graining, the family averages varied from 2.47 g to 1.01 g per dry bean with an overall average of 1.47 g and a CV of 17.63%. Accessions APA5; RB49 and UF 273 were the best performers for this trait with respectively 2.47 g; 2.03 g and 1.83g per dry bean. This study indicated that accessions EET95, UF273 and Playa Alta 2 present the best pod filling and graining. These result constitute an indicator for breeder for introduction of good genotypes in cocoa collection and their dissemination to farmers by in seeds or budwoods gardens.