RESPONSE OF SIX MALAYSIAN OIL PALM PLANTING MATERIALS TO BUD ROT DISEASE IN THE EASTERN REGION OF COLOMBIA[1]

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SUMMARY

Bud Rot (BR) is a disease affecting oil palm crops in Latinamerica which is caused by the oomycete *Phythophthora palmivora*. The effect of BR is so important that it has become one of the limiting factors for oil palm cultivation in the region. In Colombia, oil palm is cultivated in four well defined geographic regions, in which BR disease is present in different degrees of incidence, pathogenicity and virulence. Thus, while in the Western Region the palms affected by BR do not recover; in the Eastern Region palms experiment a natural recovery. As a result, the effects of BR are devastating in the Western Region, but somehow manageable in the Eastern Region.

It is plausible that in the same way the disease behaves different among regions, planting materials from different origins might react differently to BR. Also, it is known that a deficient agronomic management might contribute to make oil palms more susceptible to BR.

In 2004, six planting materials from different malaysian seed producers (M1 to M6) and three regional planting materials (R1 to R3) were planted in two localities (Barranca de Upía y Acacías) in Los Llanos Orientales , in the Eastern Region of Colombia. Among the evaluated parameters, reactivity of the plants to Bud Rot Disease (BR) was registered between 2004 and 2010. The variables measured were area under disease progress curve (AUDPC) and time (in months) to recovery (TR). There were significative differences in AUDPC and TR among the materials planted at Barranca de Upía. However at the Acacias locality there were not significative differences in the evaluated variables among the materials. The results show that M5 and M6 were the malaysian planting materials with the best response to BR at Barranca de Upía. At the same time M6 was the material with the least time to recovery.

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