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## Insect infestation and quality loss of major stored products in Ghana

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Post-harvest losses are economically significant in Ghana for a broad range of commodities, resulting in a substantial negative impact on food security and livelihoods. Maize grains are the main food crops that provide staple diet for the majority of the population. A nation-wide survey was conducted in the three different geographical zones of Ghana (Northern savannah, the semi-deciduous middle belt and the coastal zones) to determine insects infesting major staples and evaluate the damage and losses caused. At each sampling, 1 kilogram of grain was sieved. Insects, frass and grains were collected separately. A random sample of 100 grains was taken from each sample for the determination of moisture content, percentage damage, weight loss and the number of insects per kilogram. The Thousand grain mass method was used to determine dry-weight loss. The levels of grain damaged were significantly different among the samples. Maize from markets in the Central region recorded the highest mean damages (14% and 17%) while the least (0%) was from Tinga in the Northern region. *Sitophilus zeamais* was the predominant insect in all maize stores and farms across the country. Its damage was lower than that caused by *Prostephanus truncatus*. Several parasitoid Hymenoptera, and an anthocorid predator were also collected in this survey. The parasitoids will be identified to species level to help us understand their biology and consequently develop rearing models for mass release to curb the injuriousness caused.