TERRESTRIAL ARTHROPOD MONITORING PROGRAM

METABARCODING REPORT – MATTAGAMI REGION CONSERVATION AUTHORITY

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Results

A total of 1,924 different BINs (Barcode Index Numbers; a proxy for species) were encountered at the Mattagami Region Conservation Authority (MRCA) office. Over half the BINs captured were flies (Diptera), followed by bees, ants and wasps (Hymenoptera), moths and butterflies (Lepidoptera), and true bugs (Hemiptera; Figure 1).

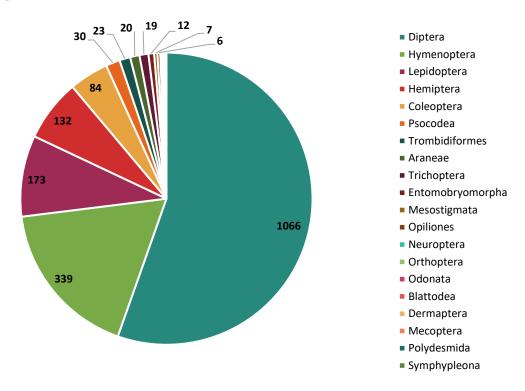


Figure 1. Taxonomic breakdown of BINs captured in the Malaise trap at the MRCA office.

Species diversity and insect abundance varied throughout the collecting period; the period that captured the most BINs was also the largest sample collected (Figure 2). The peak of species diversity was obtained towards the end of July.

In total, 577 species were named, representing 32% of the BINs. All BINs were assigned at least to family and 80% of the BINs were assigned to a genus. Specimens collected from this site represent 223 different families and 764 genera. A complete species list is attached separately.

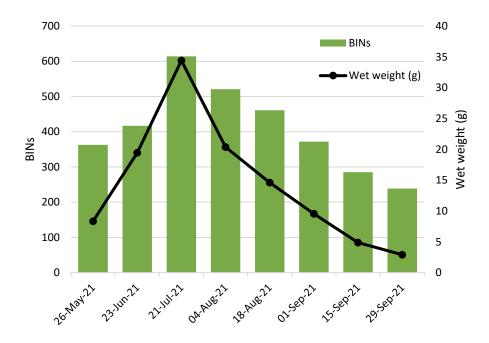


Figure 2. Species diversity (measured by BINs) and approximate insect abundance (measured by wet weight of sample) captured at the trap over the 2021 collecting period.