

ERGA Assembly Report

v24.10.15

Tags: ERGA-BGE

TxID	1208769
ToLID	ipEmbTyrr
Species	Embia tyrrhenica
Class	Insecta
Order	Embioptera

Genome Traits	Expected	Observed
Haploid size (bp)	2,837,334,911	2,574,984,954
Haploid Number	11 (source: direct)	11
Ploidy	2 (source: ancestor)	2
Sample Sex	NA	NA

EBP metrics summary and curation notes

Obtained EBP quality metric for hap1: 7.8.Q66

The following metrics were automatically flagged as below EBP recommended standards or different from expected:

- . Kmer completeness value is less than 90 for hap1

Curator notes

- . Interventions/Gb: 66
- . Contamination notes: "Contaminants were found and removed from the assembly"
- . Other observations: "13 manual breaks and 53 manual joints were made"

Quality metrics table

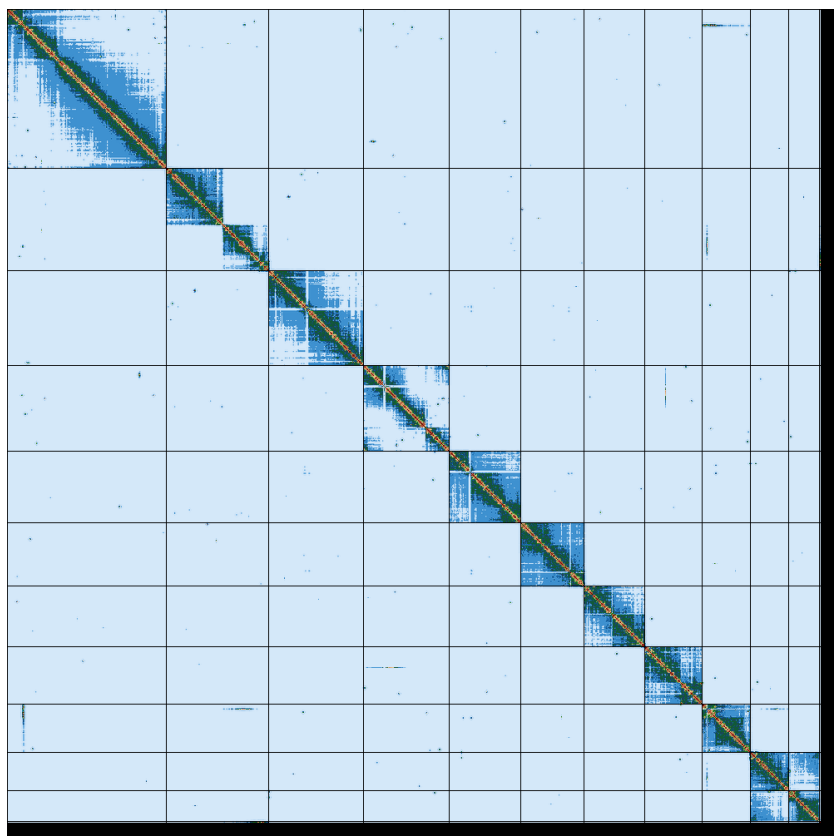
Metrics	Pre-curation hap1	Curated hap1
Total bp	2,577,151,225	2,574,984,954
GC %	33.88	33.88
Gaps/Gbp	190.13	203.11
Total gap bp	98,000	104,600
Scaffolds	708	683
Scaffold N50	589,349,641	264,305,603
Scaffold L50	2	4
Scaffold L90	7	10
Contigs	1,198	1,206
Contig N50	12,054,559	10,602,285
Contig L50	60	65
Contig L90	242	257
QV	66.4381	66.4381
Kmer compl.	73.025	73.025
BUSCO sing.	92.0%	92.7%
BUSCO dupl.	3.6%	2.9%
BUSCO frag.	0.7%	0.9%
BUSCO miss.	3.7%	3.5%

Warning! BUSCO versions or lineage datasets are not the same across results:

BUSCO: 5.8.0 (euk_genome_met, metaeuk) / Lineage: insecta_odb10 (genomes:75, BUSCOs:1367)

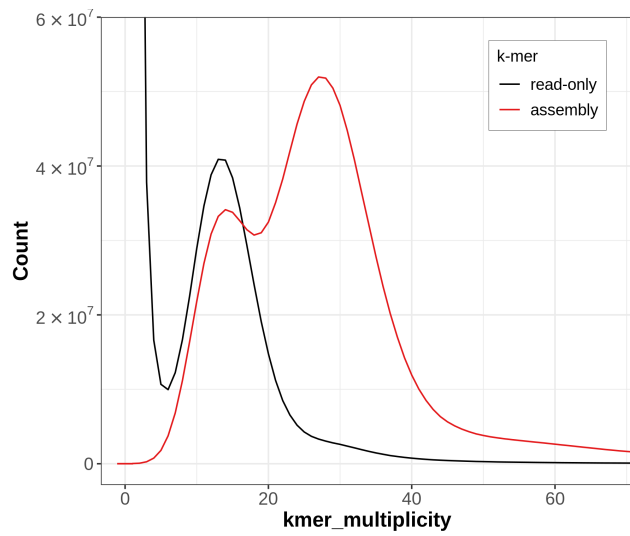
BUSCO: 5.8.0 (euk_genome_min, miniprot) / Lineage: insecta_odb10 (genomes:75, BUSCOs:1367)

HiC contact map of curated assembly

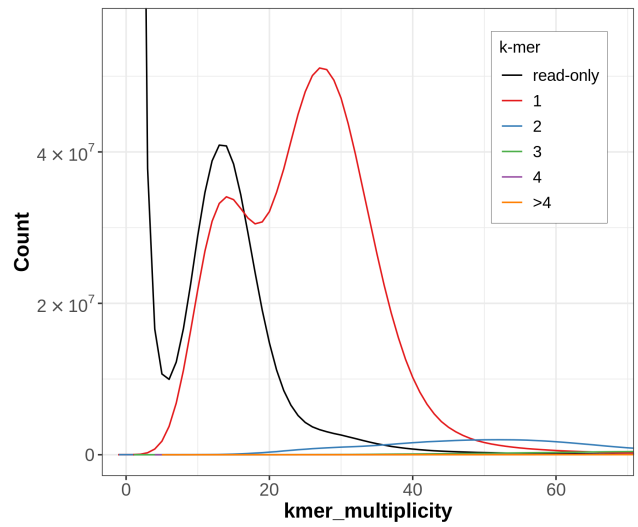


hap1 [\[LINK\]](#)

K-mer spectra of curated assembly

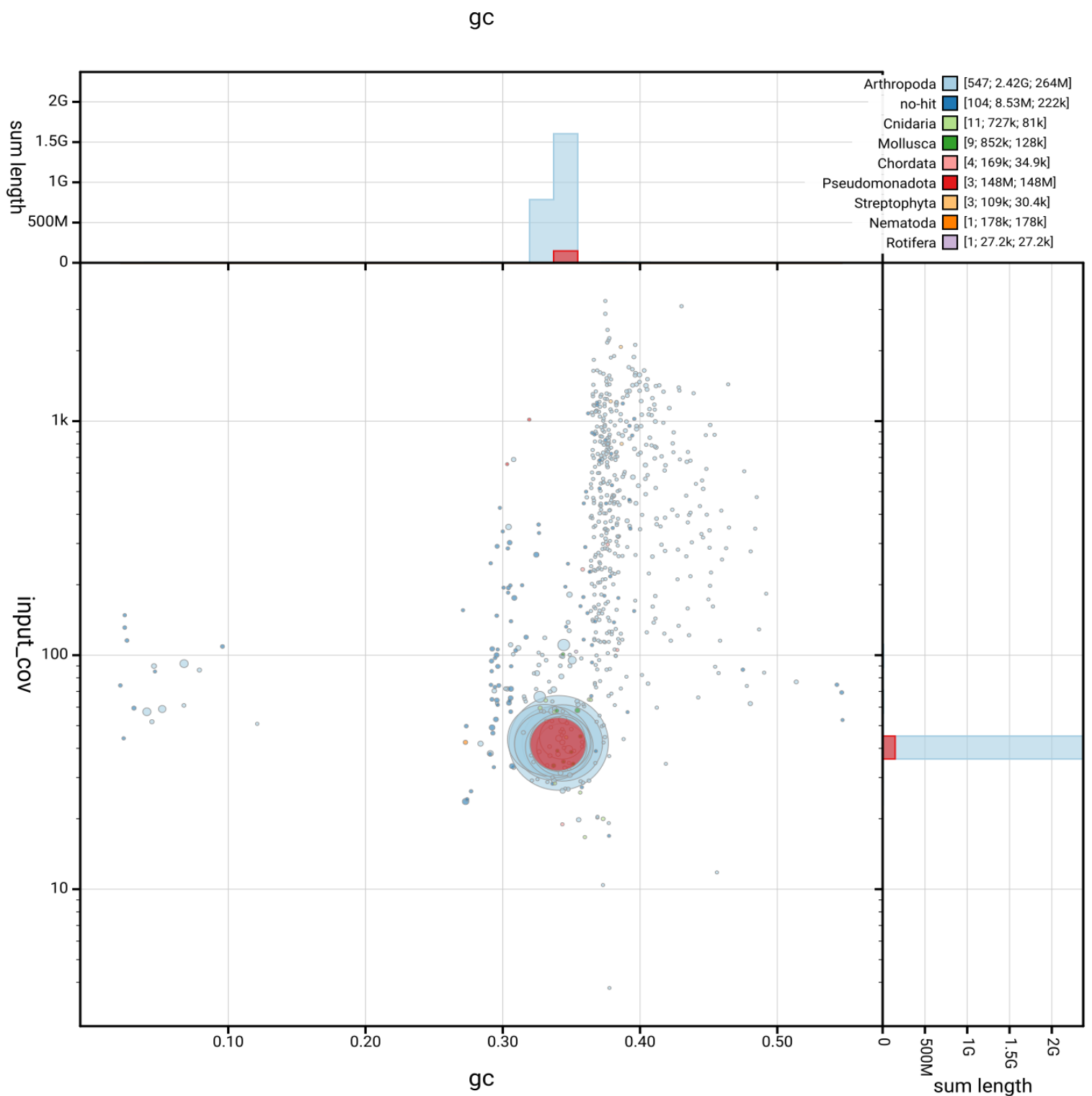


Distribution of k-mer counts coloured by their presence in reads/assemblies



Distribution of k-mer counts per copy numbers found in asm

Post-curation contamination screening



hap1. Bubble plot circles are scaled by sequence length, positioned by coverage and GC proportion, and coloured by taxonomy. Histograms show total assembly length distribution on each axis.

Data profile

Data	HiFi	HiC
Coverage	NA	NA

Assembly pipeline

- **Hifiasm**
 - |_ *ver*: Galaxy Version 0.24.0+galaxy0
 - |_ *key param*: VGP Galaxy workflow VGP3 v 0.2.8
- **purge_dups**
 - |_ *ver*: Galaxy Version 1.2.6+galaxy0
 - |_ *key param*: VGP Galaxy workflow VGP6 v 0.5
- **YaHS**
 - |_ *ver*: Galaxy Version 1.2a.2+galaxy2
 - |_ *key param*: VGP Galaxy workflow VGP8 v 1.4

Curation pipeline

- **PretextMap**
 - |_ *ver*: Galaxy Version 0.1.9+galaxy1
 - |_ *key param*: VGP workflow VGP PretextMap generation v2
- **PretextView**
 - |_ *ver*: 1.0.0
 - |_ *key param*: NA

Submitter: Marcella Sozzoni

Affiliation: UNIFI

Date and time: 2025-06-18 11:13:02 CEST