

Note: Tracks are now grouped by subcluster and scaled. Switching in subcluster is indicated by changes in track color. Track scale is now set by default to display the region 30 bp upstream of start 1 to 30 bp downstream of the last possible start. If this default region is judged to be packed too tightly with annotated starts, the track will be further scaled to only show that region of the ORF with annotated starts. This action will be indicated by adding "Zoomed" to the title. For starts, yellow indicates the location of called starts comprised solely of Glimmer/GeneMark auto-annotations, green indicates the location of called starts with at least 1 manual gene annotation.

# Pham 7411 Report

This analysis was run 04/28/24 on database version 559.

Pham number 7411 has 7 members, 1 are drafts.

Phages represented in each track:

Track 1 : JustBecause\_207, Kela\_205

• Track 2: Nirvana 233

Track 3: EhyElimayoE\_209, Kradal\_208, Satis\_206

Track 4 : Frankenweenie\_223

## Summary of Final Annotations (See graph section above for start numbers):

The start number called the most often in the published annotations is 6, it was called in 6 of the 6 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• EhyElimayoE\_209, Frankenweenie\_223, JustBecause\_207, Kela\_205, Kradal\_208, Nirvana\_233, Satis\_206,

Genes that have the "Most Annotated" start but do not call it:

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Genes that do not have the "Most Annotated" start:

Summary by start number:

#### Start 6:

- Found in 7 of 7 (100.0%) of genes in pham
- Manual Annotations of this start: 6 of 6
- Called 100.0% of time when present
- Phage (with cluster) where this start called: EhyElimayoE\_209 (BM),
  Frankenweenie\_223 (BM), JustBecause\_207 (BM), Kela\_205 (BM), Kradal\_208 (BM), Nirvana\_233 (BM), Satis\_206 (BM),

### Summary by clusters:

There is one cluster represented in this pham: BM

Info for manual annotations of cluster BM:

•Start number 6 was manually annotated 6 times for cluster BM.

#### Gene Information:

Gene: EhyElimayoE\_209 Start: 127338, Stop: 127832, Start Num: 6 Candidate Starts for EhyElimayoE\_209: (1, 127068), (3, 127242), (4, 127287), (5, 127329), (Start: 6 @127338 has 6 MA's), (9, 127467), (11,

(1, 127068), (3, 127242), (4, 127287), (5, 127329), (Start: 6 @127338 has 6 MA's), (9, 127467), (11 127488), (13, 127509), (14, 127527), (15, 127530), (17, 127572), (18, 127575), (22, 127662), (24, 127665),

Gene: Frankenweenie\_223 Start: 136675, Stop: 137193, Start Num: 6 Candidate Starts for Frankenweenie 223:

(3, 136585), (4, 136630), (5, 136666), (Start: 6 @136675 has 6 MA's), (7, 136732), (8, 136762), (10, 136822), (11, 136825), (12, 136831), (14, 136864), (16, 136897), (19, 136945), (20, 136963), (23, 137023), (26, 137101),

Gene: JustBecause\_207 Start: 124446, Stop: 124946, Start Num: 6 Candidate Starts for JustBecause 207:

(2, 124272), (Start: 6 @124446 has 6 MA's), (8, 124533), (13, 124617), (15, 124638), (18, 124683), (24, 124776), (25, 124821),

Gene: Kela\_205 Start: 124291, Stop: 124791, Start Num: 6 Candidate Starts for Kela 205:

(2, 124117), (Start: 6 @124291 has 6 MA's), (8, 124378), (13, 124462), (15, 124483), (18, 124528), (24, 124621), (25, 124666),

Gene: Kradal\_208 Start: 127335, Stop: 127829, Start Num: 6 Candidate Starts for Kradal 208:

(1, 127065), (3, 127239), (4, 127284), (5, 127326), (Start: 6 @ 127335 has 6 MA's), (9, 127464), (11, 127485), (13, 127506), (14, 127524), (15, 127527), (17, 127569), (18, 127572), (22, 127659), (24, 127662),

Gene: Nirvana\_233 Start: 134965, Stop: 135465, Start Num: 6 Candidate Starts for Nirvana 233:

(4, 134911), (5, 134956), (Start: 6 @134965 has 6 MA's), (7, 135022), (10, 135112), (11, 135115), (17, 135199), (18, 135202), (21, 135274), (24, 135295),

Gene: Satis\_206 Start: 127672, Stop: 128166, Start Num: 6 Candidate Starts for Satis 206:

(1, 127402), (3, 127576), (4, 127621), (5, 127663), (Start: 6 @127672 has 6 MA's), (9, 127801), (11, 127822), (13, 127843), (14, 127861), (15, 127864), (17, 127906), (18, 127909), (22, 127996), (24, 127999),