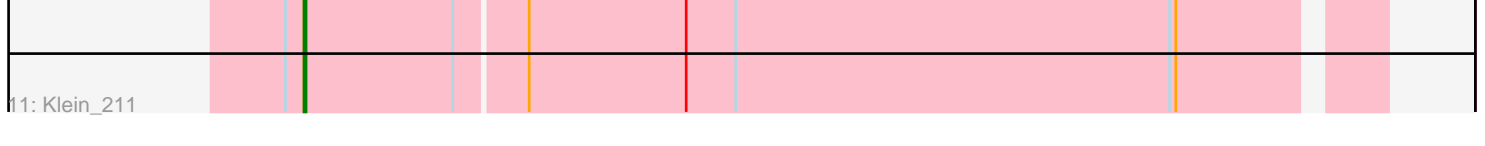
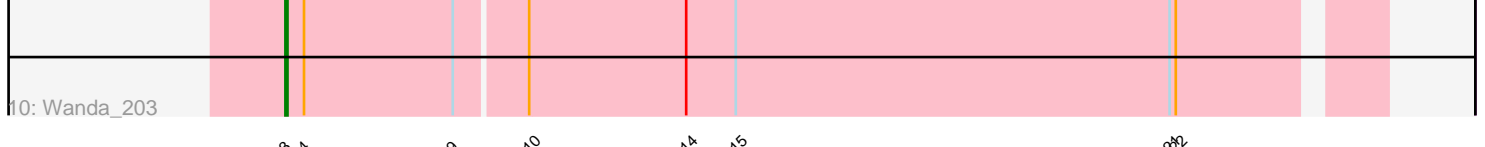
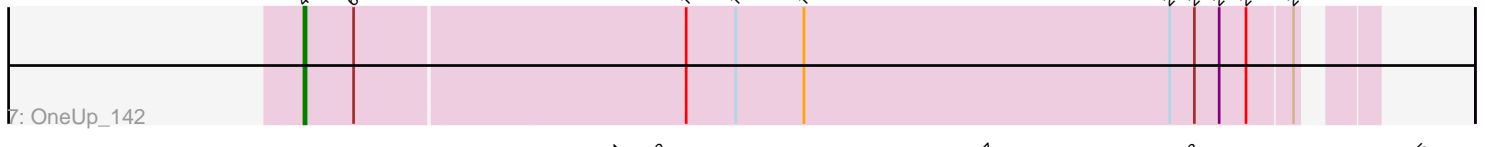
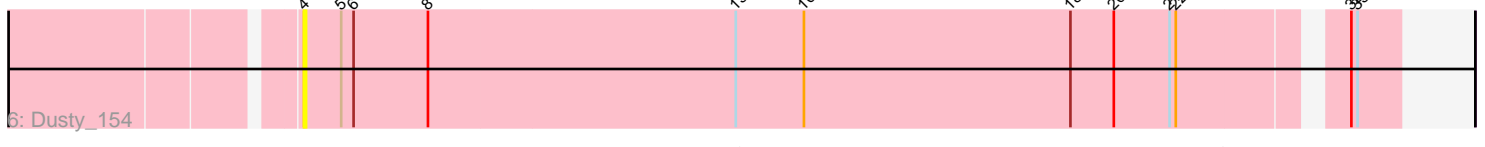
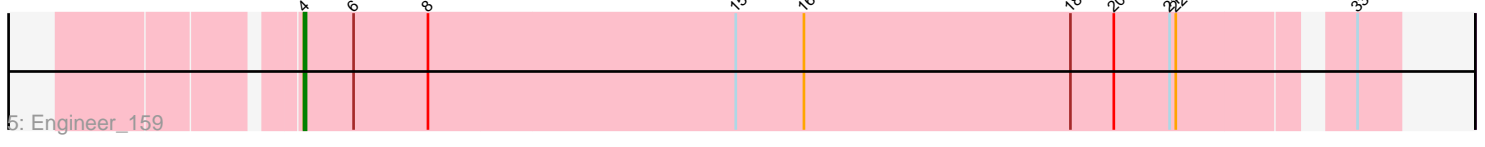
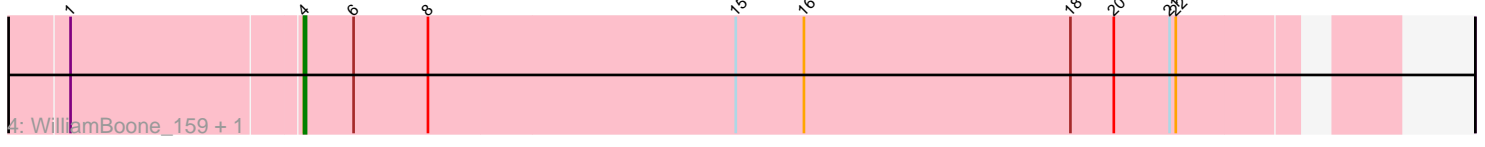
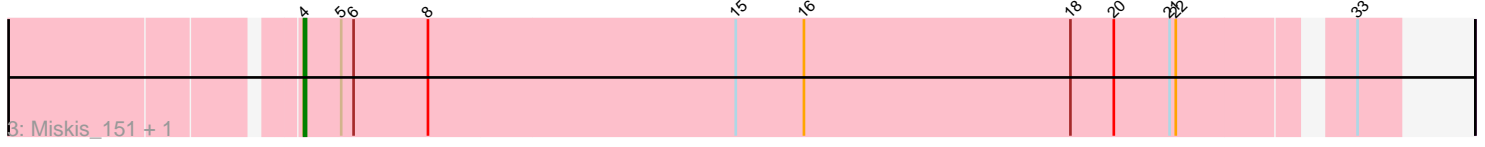
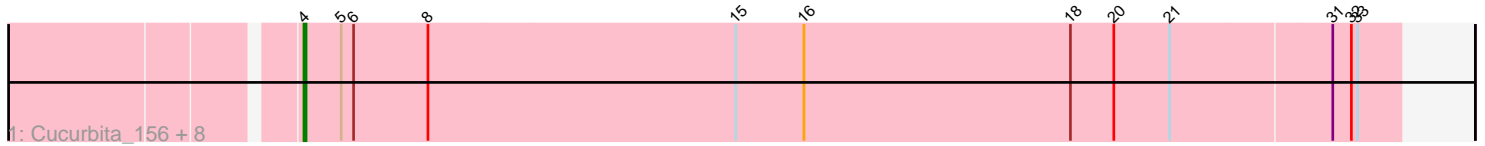


Pham 223433



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 223433 Report

This analysis was run 03/28/25 on database version 593.

Pham number 223433 has 21 members, 2 are drafts.

Phages represented in each track:

- Track 1 : Cucurbita_156, Norvs_155, Bachita_160, Smoothie_158, Lozinak_157, PhinkBoden_155, Abscondus_155, Toniann_157, ClubL_158
- Track 2 : Geeche_157
- Track 3 : Miskis_151, Aphelion_157
- Track 4 : WilliamBoone_159, Culver_157
- Track 5 : Engineer_159
- Track 6 : Dusty_154
- Track 7 : OneUp_142
- Track 8 : DobbysSock_51
- Track 9 : Kuwabara_75
- Track 10 : Wanda_203
- Track 11 : Klein_211

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

The start number called the most often in the published annotations is 4, it was called in 16 of the 19 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Abscondus_155, Aphelion_157, Bachita_160, ClubL_158, Cucurbita_156, Culver_157, Dusty_154, Engineer_159, Geeche_157, Klein_211, Lozinak_157, Miskis_151, Norvs_155, OneUp_142, PhinkBoden_155, Smoothie_158, Toniann_157, WilliamBoone_159,

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

- Wanda_203,

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

- DobbysSock_51, Kuwabara_75,

Summary by start number:

Start 3:

- Found in 2 of 21 (9.5%) of genes in pham

- Manual Annotations of this start: 1 of 19
- Called 50.0% of time when present
- Phage (with cluster) where this start called: Wanda_203 (J),

Start 4:

- Found in 19 of 21 (90.5%) of genes in pham
- Manual Annotations of this start: 16 of 19
- Called 94.7% of time when present
- Phage (with cluster) where this start called: Abscondus_155 (CQ1), Aphelion_157 (CQ1), Bachita_160 (CQ1), ClubL_158 (CQ1), Cucurbita_156 (CQ1), Culver_157 (CQ1), Dusty_154 (CQ1), Engineer_159 (CQ1), Geeche_157 (CQ1), Klein_211 (J), Lozinak_157 (CQ1), Miskis_151 (CQ1), Norvs_155 (CQ1), OneUp_142 (CQ2), PhinkBoden_155 (CQ1), Smoothie_158 (CQ1), Toniann_157 (CQ1), WilliamBoone_159 (CQ1),

Start 7:

- Found in 2 of 21 (9.5%) of genes in pham
- Manual Annotations of this start: 2 of 19
- Called 100.0% of time when present
- Phage (with cluster) where this start called: DobbysSock_51 (CZ4), Kuwabara_75 (DN4),

Summary by clusters:

There are 5 clusters represented in this pham: CQ2, CQ1, J, CZ4, DN4,

Info for manual annotations of cluster CQ1:

- Start number 4 was manually annotated 14 times for cluster CQ1.

Info for manual annotations of cluster CQ2:

- Start number 4 was manually annotated 1 time for cluster CQ2.

Info for manual annotations of cluster CZ4:

- Start number 7 was manually annotated 1 time for cluster CZ4.

Info for manual annotations of cluster DN4:

- Start number 7 was manually annotated 1 time for cluster DN4.

Info for manual annotations of cluster J:

- Start number 3 was manually annotated 1 time for cluster J.
- Start number 4 was manually annotated 1 time for cluster J.

Gene Information:

Gene: Abscondus_155 Start: 83304, Stop: 82780, Start Num: 4

Candidate Starts for Abscondus_155:

(Start: 4 @83304 has 16 MA's), (5, 83286), (6, 83280), (8, 83244), (15, 83097), (16, 83064), (18, 82935), (20, 82914), (21, 82887), (31, 82812), (32, 82803), (33, 82800),

Gene: Aphelion_157 Start: 84453, Stop: 83941, Start Num: 4

Candidate Starts for Aphelion_157:

(Start: 4 @84453 has 16 MA's), (5, 84435), (6, 84429), (8, 84393), (15, 84246), (16, 84213), (18, 84084), (20, 84063), (21, 84036), (22, 84033), (33, 83961),

Gene: Bachita_160 Start: 84344, Stop: 83820, Start Num: 4

Candidate Starts for Bachita_160:

(Start: 4 @84344 has 16 MA's), (5, 84326), (6, 84320), (8, 84284), (15, 84137), (16, 84104), (18, 83975), (20, 83954), (21, 83927), (31, 83852), (32, 83843), (33, 83840),

Gene: ClubL_158 Start: 83596, Stop: 83072, Start Num: 4

Candidate Starts for ClubL_158:

(Start: 4 @83596 has 16 MA's), (5, 83578), (6, 83572), (8, 83536), (15, 83389), (16, 83356), (18, 83227), (20, 83206), (21, 83179), (31, 83104), (32, 83095), (33, 83092),

Gene: Cucurbita_156 Start: 84657, Stop: 84133, Start Num: 4

Candidate Starts for Cucurbita_156:

(Start: 4 @84657 has 16 MA's), (5, 84639), (6, 84633), (8, 84597), (15, 84450), (16, 84417), (18, 84288), (20, 84267), (21, 84240), (31, 84165), (32, 84156), (33, 84153),

Gene: Culver_157 Start: 82846, Stop: 82337, Start Num: 4

Candidate Starts for Culver_157:

(1, 82954), (Start: 4 @82846 has 16 MA's), (6, 82822), (8, 82786), (15, 82639), (16, 82606), (18, 82477), (20, 82456), (21, 82429), (22, 82426),

Gene: DobbysSock_51 Start: 37985, Stop: 38485, Start Num: 7

Candidate Starts for DobbysSock_51:

(2, 37925), (Start: 7 @37985 has 2 MA's), (11, 38090), (12, 38111), (17, 38270), (23, 38369), (35, 38477),

Gene: Dusty_154 Start: 83321, Stop: 82809, Start Num: 4

Candidate Starts for Dusty_154:

(Start: 4 @83321 has 16 MA's), (5, 83303), (6, 83297), (8, 83261), (15, 83114), (16, 83081), (18, 82952), (20, 82931), (21, 82904), (22, 82901), (32, 82832), (33, 82829),

Gene: Engineer_159 Start: 84171, Stop: 83659, Start Num: 4

Candidate Starts for Engineer_159:

(Start: 4 @84171 has 16 MA's), (6, 84147), (8, 84111), (15, 83964), (16, 83931), (18, 83802), (20, 83781), (21, 83754), (22, 83751), (33, 83679),

Gene: Geeche_157 Start: 83545, Stop: 83033, Start Num: 4

Candidate Starts for Geeche_157:

(Start: 4 @83545 has 16 MA's), (5, 83527), (6, 83521), (8, 83485), (15, 83338), (18, 83176), (20, 83155), (21, 83128), (22, 83125), (26, 83092), (33, 83053),

Gene: Klein_211 Start: 101652, Stop: 101146, Start Num: 4

Candidate Starts for Klein_211:

(Start: 3 @101661 has 1 MA's), (Start: 4 @101652 has 16 MA's), (9, 101580), (10, 101547), (14, 101472), (15, 101448), (21, 101238), (22, 101235),

Gene: Kuwabara_75 Start: 45173, Stop: 45688, Start Num: 7

Candidate Starts for Kuwabara_75:

(Start: 7 @45173 has 2 MA's), (11, 45275), (12, 45296), (13, 45299), (16, 45368), (17, 45455), (19, 45500), (23, 45554), (27, 45584), (28, 45596), (30, 45611), (34, 45650),

Gene: Lozinak_157 Start: 84185, Stop: 83661, Start Num: 4

Candidate Starts for Lozinak_157:

(Start: 4 @84185 has 16 MA's), (5, 84167), (6, 84161), (8, 84125), (15, 83978), (16, 83945), (18, 83816), (20, 83795), (21, 83768), (31, 83693), (32, 83684), (33, 83681),

Gene: Miskis_151 Start: 83202, Stop: 82690, Start Num: 4

Candidate Starts for Miskis_151:

(Start: 4 @83202 has 16 MA's), (5, 83184), (6, 83178), (8, 83142), (15, 82995), (16, 82962), (18, 82833), (20, 82812), (21, 82785), (22, 82782), (33, 82710),

Gene: Norvs_155 Start: 83376, Stop: 82852, Start Num: 4

Candidate Starts for Norvs_155:

(Start: 4 @83376 has 16 MA's), (5, 83358), (6, 83352), (8, 83316), (15, 83169), (16, 83136), (18, 83007), (20, 82986), (21, 82959), (31, 82884), (32, 82875), (33, 82872),

Gene: OneUp_142 Start: 83012, Stop: 82515, Start Num: 4

Candidate Starts for OneUp_142:

(Start: 4 @83012 has 16 MA's), (6, 82988), (14, 82832), (15, 82808), (16, 82775), (21, 82598), (24, 82586), (25, 82574), (26, 82562), (29, 82541),

Gene: PhinkBoden_155 Start: 83774, Stop: 83250, Start Num: 4

Candidate Starts for PhinkBoden_155:

(Start: 4 @83774 has 16 MA's), (5, 83756), (6, 83750), (8, 83714), (15, 83567), (16, 83534), (18, 83405), (20, 83384), (21, 83357), (31, 83282), (32, 83273), (33, 83270),

Gene: Smoothie_158 Start: 83875, Stop: 83351, Start Num: 4

Candidate Starts for Smoothie_158:

(Start: 4 @83875 has 16 MA's), (5, 83857), (6, 83851), (8, 83815), (15, 83668), (16, 83635), (18, 83506), (20, 83485), (21, 83458), (31, 83383), (32, 83374), (33, 83371),

Gene: Toniann_157 Start: 83517, Stop: 82993, Start Num: 4

Candidate Starts for Toniann_157:

(Start: 4 @83517 has 16 MA's), (5, 83499), (6, 83493), (8, 83457), (15, 83310), (16, 83277), (18, 83148), (20, 83127), (21, 83100), (31, 83025), (32, 83016), (33, 83013),

Gene: Wanda_203 Start: 99291, Stop: 98776, Start Num: 3

Candidate Starts for Wanda_203:

(Start: 3 @99291 has 1 MA's), (Start: 4 @99282 has 16 MA's), (9, 99210), (10, 99177), (14, 99102), (15, 99078), (21, 98868), (22, 98865),

Gene: WilliamBoone_159 Start: 81962, Stop: 81453, Start Num: 4

Candidate Starts for WilliamBoone_159:

(1, 82070), (Start: 4 @81962 has 16 MA's), (6, 81938), (8, 81902), (15, 81755), (16, 81722), (18, 81593), (20, 81572), (21, 81545), (22, 81542),