Pham 150832


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 150832 Report

This analysis was run 04/05/24 on database version 557.
Pham number 150832 has 15 members, 2 are drafts.
Phages represented in each track:

- Track 1 : Nedarya_89
- Track 2 : Abscondus 174
- Track 3 : Bachita_17 $\overline{9}$
- Track 4 : Lozinak_177, PhinkBoden_174, Aphelion_175, Norvs_174, Toniann_177, Miskis_177, Smoothie_178, Cucurbita_176, ClubL_177
- Track 5 : WilliamBooñe_182
- Track 6 : Engineer_178
- Track 7 : Culver_179


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

The start number called the most often in the published annotations is 7, it was called in 12 of the 13 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Abscondus 174, Aphelion_175, ClubL_177, Cucurbita_176, Culver_179,

Engineer_178, Lozinak_177, Miskis_177, Nedarya_89, Norvs_174, PhinkBoden_174, Smoothie_178, Toniann_177, WilliamBoone_182,

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

- Bachita_179,

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

## Summary by start number:

Start 6:

- Found in 12 of 15 ( 80.0\%) of genes in pham
- Manual Annotations of this start: 1 of 13
- Called $8.3 \%$ of time when present
- Phage (with cluster) where this start called: Bachita_179 (CQ1),

Start 7:

- Found in 15 of 15 ( $100.0 \%$ ) of genes in pham
- Manual Annotations of this start: 12 of 13
- Called $93.3 \%$ of time when present
- Phage (with cluster) where this start called: Abscondus_174 (CQ), Aphelion_175
(CQ1), ClubL_177 (CQ1), Cucurbita 176 (CQ1), Culver_179 (CQ1), Engineer_178 (CQ1), Lozināk 177 (CQ1), Miskis_177 (CQ), Nedarya_89 (A15), Norvs_174 (CQ), PhinkBoden_174 (CQ1), Smoothie_178 (CQ1), Tonianñ_177 (CQ1), WilliamBoone_182 (CQ1),


## Summary by clusters:

There are 3 clusters represented in this pham: A15, CQ1, CQ,
Info for manual annotations of cluster A15:

- Start number 7 was manually annotated 1 time for cluster A15.

Info for manual annotations of cluster CQ:

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

Info for manual annotations of cluster CQ1:

- Start number 6 was manually annotated 1 time for cluster CQ1.
- Start number 7 was manually annotated 10 times for cluster CQ1.


## Gene Information:

Gene: Abscondus_174 Start: 87999, Stop: 87820, Start Num: 7
Candidate Starts for Abscondus_174:
(1, 88182), (Start: 6 @88014 has 1 MA's), (Start: 7 @87999 has 12 MA's), (9, 87984), (17, 87927), (18, 87852),

Gene: Aphelion_175 Start: 88897, Stop: 88718, Start Num: 7
Candidate Starts for Aphelion_175:
(Start: 6 @88912 has 1 MA's), (Start: 7 @88897 has 12 MA's), (9, 88882), (10, 88867), (17, 88825), (18, 88750),

Gene: Bachita_179 Start: 88991, Stop: 88794, Start Num: 6
Candidate Starts for Bachita_179:
(2, 89093), (3, 89081), (4, 89063), (Start: 6 @88991 has 1 MA's), (Start: 7 @88973 has 12 MA's), (9, 88958), (11, 88937), (17, 88901), (18, 88826),

Gene: ClubL_177 Start: 88218, Stop: 88039, Start Num: 7
Candidate Starts for ClubL_177:
(Start: 6 @88233 has 1 MA's), (Start: 7 @88218 has 12 MA's), (9, 88203), (10, 88188), (17, 88146), (18, 88071),

Gene: Cucurbita_176 Start: 89279, Stop: 89100, Start Num: 7
Candidate Starts for Cucurbita_176:
(Start: 6 @89294 has 1 MA's), (Start: 7 @89279 has 12 MA's), (9, 89264), (10, 89249), (17, 89207), $(18,89132)$,

Gene: Culver_179 Start: 87812, Stop: 87633, Start Num: 7

Candidate Starts for Culver_179:
(5, 87830), (Start: 7 @87812 has 12 MA's), (9, 87797), (11, 87776), (15, 87752), (17, 87740), (18, 87665),

Gene: Engineer_178 Start: 88974, Stop: 88795, Start Num: 7
Candidate Starts for Engineer_178:
(Start: 6 @88989 has 1 MA's), (Start: 7 @88974 has 12 MA's), (9, 88959), (11, 88938), (17, 88902), (18, 88827),

Gene: Lozinak_177 Start: 88822, Stop: 88643, Start Num: 7
Candidate Starts for Lozinak_177:
(Start: 6 @88837 has 1 MA's), (Start: 7 @88822 has 12 MA's), (9, 88807), (10, 88792), (17, 88750), (18, 88675),

Gene: Miskis_177 Start: 87663, Stop: 87484, Start Num: 7
Candidate Starts for Miskis_177:
(Start: 6 @87678 has 1 MA's), (Start: 7 @87663 has 12 MA's), (9, 87648), (10, 87633), (17, 87591), (18, 87516),

Gene: Nedarya_89 Start: 48485, Stop: 48312, Start Num: 7
Candidate Starts for Nedarya_89:
(Start: 7 @48485 has 12 MA's), (10, 48455), (11, 48449), (12, 48437), (13, 48434), (14, 48431), (16, 48422), (18, 48344),

Gene: Norvs_174 Start: 87998, Stop: 87819, Start Num: 7
Candidate Starts for Norvs_174:
(Start: 6 @88013 has 1 MA's), (Start: 7 @87998 has 12 MA's), (9, 87983), (10, 87968), (17, 87926), (18, 87851),

Gene: PhinkBoden_174 Start: 88396, Stop: 88217, Start Num: 7
Candidate Starts for PhinkBoden_174:
(Start: 6 @88411 has 1 MA's), (Start: 7 @88396 has 12 MA's), (9, 88381), (10, 88366), (17, 88324), (18, 88249),

Gene: Smoothie_178 Start: 88694, Stop: 88515, Start Num: 7
Candidate Starts for Smoothie_178:
(Start: 6 @88709 has 1 MA's), (Start: 7 @88694 has 12 MA's), (9, 88679), (10, 88664), (17, 88622), (18, 88547),

Gene: Toniann_177 Start: 88139, Stop: 87960, Start Num: 7
Candidate Starts for Toniann_177:
(Start: 6 @88154 has 1 MA's), (Start: 7 @88139 has 12 MA's), (9, 88124), (10, 88109), (17, 88067), (18, 87992),

Gene: WilliamBoone_182 Start: 87648, Stop: 87454, Start Num: 7
Candidate Starts for WilliamBoone_182:
(5, 87666), (Start: 7 @87648 has 12 MA's), (8, 87633), (9, 87618), (11, 87597), (15, 87573), (17, 87561), (18, 87486),

