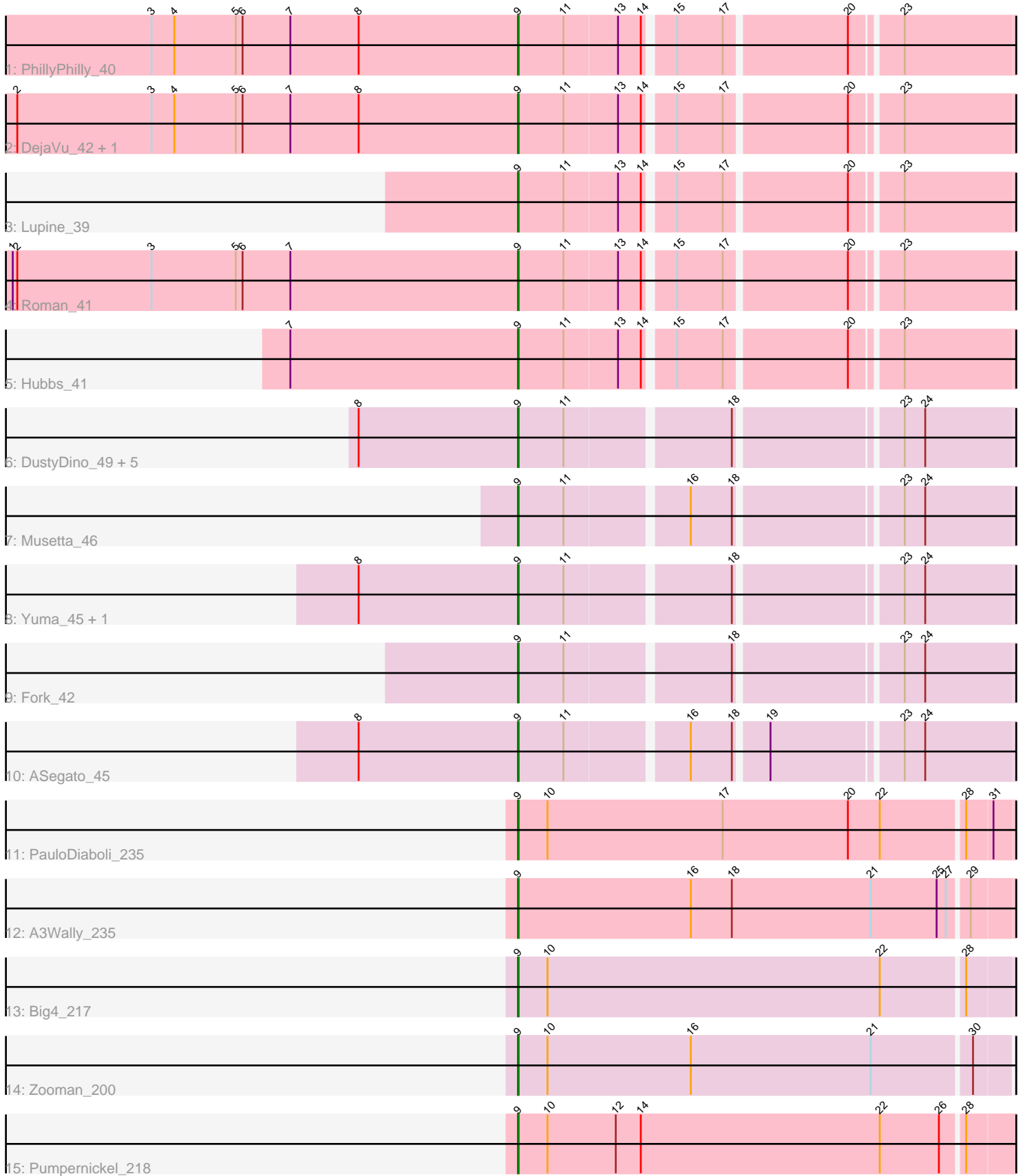


Pham 158164



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 158164 Report

This analysis was run 04/13/24 on database version 558.

Pham number 158164 has 22 members, 2 are drafts.

Phages represented in each track:

- Track 1 : PhillyPhilly\_40
- Track 2 : DejaVu\_42, Pavlo\_39
- Track 3 : Lupine\_39
- Track 4 : Roman\_41
- Track 5 : Hubbs\_41
- Track 6 : DustyDino\_49, Welcome\_47, Lyell\_46, RunningBrook\_48, StevieWelch\_46, Necrophoxinus\_48
- Track 7 : Musetta\_46
- Track 8 : Yuma\_45, Erenyeager\_46
- Track 9 : Fork\_42
- Track 10 : ASegato\_45
- Track 11 : PauloDiaboli\_235
- Track 12 : A3Wally\_235
- Track 13 : Big4\_217
- Track 14 : Zooman\_200
- Track 15 : Pumpernickel\_218

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

The start number called the most often in the published annotations is 9, it was called in 20 of the 20 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- A3Wally\_235, ASegato\_45, Big4\_217, DejaVu\_42, DustyDino\_49, Erenyeager\_46, Fork\_42, Hubbs\_41, Lupine\_39, Lyell\_46, Musetta\_46, Necrophoxinus\_48, PauloDiaboli\_235, Pavlo\_39, PhillyPhilly\_40, Pumpernickel\_218, Roman\_41, RunningBrook\_48, StevieWelch\_46, Welcome\_47, Yuma\_45, Zooman\_200,

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

- 

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

-

## Summary by start number:

Start 9:

- Found in 22 of 22 ( 100.0% ) of genes in pham
- Manual Annotations of this start: 20 of 20
- Called 100.0% of time when present
- Phage (with cluster) where this start called: A3Wally\_235 (GD1), ASegato\_45 (ED2), Big4\_217 (GD2), DejaVu\_42 (ED1), DustyDino\_49 (ED2), Erenyeager\_46 (ED2), Fork\_42 (ED2), Hubbs\_41 (ED1), Lupine\_39 (ED1), Lyell\_46 (ED2), Musetta\_46 (ED2), Necrophoxinus\_48 (ED2), PauloDiaboli\_235 (GD1), Pavlo\_39 (ED1), PhillyPhilly\_40 (ED1), Pumpernickel\_218 (GD4), Roman\_41 (ED1), RunningBrook\_48 (ED2), StevieWelch\_46 (ED2), Welcome\_47 (ED2), Yuma\_45 (ED2), Zooman\_200 (GD2),

## Summary by clusters:

There are 5 clusters represented in this pham: ED2, GD1, GD2, ED1, GD4,

Info for manual annotations of cluster ED1:

- Start number 9 was manually annotated 6 times for cluster ED1.

Info for manual annotations of cluster ED2:

- Start number 9 was manually annotated 9 times for cluster ED2.

Info for manual annotations of cluster GD1:

- Start number 9 was manually annotated 2 times for cluster GD1.

Info for manual annotations of cluster GD2:

- Start number 9 was manually annotated 2 times for cluster GD2.

Info for manual annotations of cluster GD4:

- Start number 9 was manually annotated 1 time for cluster GD4.

## Gene Information:

Gene: A3Wally\_235 Start: 125991, Stop: 126635, Start Num: 9

Candidate Starts for A3Wally\_235:

(Start: 9 @125991 has 20 MA's), (16, 126219), (18, 126273), (21, 126456), (25, 126543), (27, 126555), (29, 126579),

Gene: ASegato\_45 Start: 19908, Stop: 20519, Start Num: 9

Candidate Starts for ASegato\_45:

(8, 19698), (Start: 9 @19908 has 20 MA's), (11, 19968), (16, 20118), (18, 20172), (19, 20211), (23, 20373), (24, 20400),

Gene: Big4\_217 Start: 121400, Stop: 122044, Start Num: 9

Candidate Starts for Big4\_217:

(Start: 9 @121400 has 20 MA's), (10, 121439), (22, 121877), (28, 121982),

Gene: DejaVu\_42 Start: 19157, Stop: 19768, Start Num: 9

Candidate Starts for DejaVu\_42:

(2, 18497), (3, 18674), (4, 18704), (5, 18785), (6, 18794), (7, 18857), (8, 18947), (Start: 9 @19157 has 20 MA's), (11, 19217), (13, 19286), (14, 19316), (15, 19349), (17, 19409), (20, 19562), (23, 19622),

Gene: DustyDino\_49 Start: 20847, Stop: 21458, Start Num: 9

Candidate Starts for DustyDino\_49:

(8, 20637), (Start: 9 @20847 has 20 MA's), (11, 20907), (18, 21111), (23, 21312), (24, 21339),

Gene: Erenyeager\_46 Start: 20242, Stop: 20853, Start Num: 9

Candidate Starts for Erenyeager\_46:

(8, 20032), (Start: 9 @20242 has 20 MA's), (11, 20302), (18, 20506), (23, 20707), (24, 20734),

Gene: Fork\_42 Start: 19557, Stop: 20168, Start Num: 9

Candidate Starts for Fork\_42:

(Start: 9 @19557 has 20 MA's), (11, 19617), (18, 19821), (23, 20022), (24, 20049),

Gene: Hubbs\_41 Start: 19369, Stop: 19980, Start Num: 9

Candidate Starts for Hubbs\_41:

(7, 19069), (Start: 9 @19369 has 20 MA's), (11, 19429), (13, 19498), (14, 19528), (15, 19561), (17, 19621), (20, 19774), (23, 19834),

Gene: Lupine\_39 Start: 18570, Stop: 19181, Start Num: 9

Candidate Starts for Lupine\_39:

(Start: 9 @18570 has 20 MA's), (11, 18630), (13, 18699), (14, 18729), (15, 18762), (17, 18822), (20, 18975), (23, 19035),

Gene: Lyell\_46 Start: 20161, Stop: 20772, Start Num: 9

Candidate Starts for Lyell\_46:

(8, 19951), (Start: 9 @20161 has 20 MA's), (11, 20221), (18, 20425), (23, 20626), (24, 20653),

Gene: Musetta\_46 Start: 20279, Stop: 20890, Start Num: 9

Candidate Starts for Musetta\_46:

(Start: 9 @20279 has 20 MA's), (11, 20339), (16, 20489), (18, 20543), (23, 20744), (24, 20771),

Gene: Necrophoxinus\_48 Start: 20855, Stop: 21466, Start Num: 9

Candidate Starts for Necrophoxinus\_48:

(8, 20645), (Start: 9 @20855 has 20 MA's), (11, 20915), (18, 21119), (23, 21320), (24, 21347),

Gene: PauloDiaboli\_235 Start: 124195, Stop: 124839, Start Num: 9

Candidate Starts for PauloDiaboli\_235:

(Start: 9 @124195 has 20 MA's), (10, 124234), (17, 124465), (20, 124630), (22, 124672), (28, 124777), (31, 124810),

Gene: Pavlo\_39 Start: 18848, Stop: 19459, Start Num: 9

Candidate Starts for Pavlo\_39:

(2, 18188), (3, 18365), (4, 18395), (5, 18476), (6, 18485), (7, 18548), (8, 18638), (Start: 9 @18848 has 20 MA's), (11, 18908), (13, 18977), (14, 19007), (15, 19040), (17, 19100), (20, 19253), (23, 19313),

Gene: PhillyPhilly\_40 Start: 18750, Stop: 19361, Start Num: 9

Candidate Starts for PhillyPhilly\_40:

(3, 18267), (4, 18297), (5, 18378), (6, 18387), (7, 18450), (8, 18540), (Start: 9 @18750 has 20 MA's), (11, 18810), (13, 18879), (14, 18909), (15, 18942), (17, 19002), (20, 19155), (23, 19215),

Gene: Pumpernickel\_218 Start: 125283, Stop: 125930, Start Num: 9

Candidate Starts for Pumpernickel\_218:

(Start: 9 @125283 has 20 MA's), (10, 125322), (12, 125412), (14, 125445), (22, 125760), (26, 125838), (28, 125865),

Gene: Roman\_41 Start: 19216, Stop: 19827, Start Num: 9

Candidate Starts for Roman\_41:

(1, 18550), (2, 18556), (3, 18733), (5, 18844), (6, 18853), (7, 18916), (Start: 9 @19216 has 20 MA's), (11, 19276), (13, 19345), (14, 19375), (15, 19408), (17, 19468), (20, 19621), (23, 19681),

Gene: RunningBrook\_48 Start: 20847, Stop: 21458, Start Num: 9

Candidate Starts for RunningBrook\_48:

(8, 20637), (Start: 9 @20847 has 20 MA's), (11, 20907), (18, 21111), (23, 21312), (24, 21339),

Gene: StevieWelch\_46 Start: 20247, Stop: 20858, Start Num: 9

Candidate Starts for StevieWelch\_46:

(8, 20037), (Start: 9 @20247 has 20 MA's), (11, 20307), (18, 20511), (23, 20712), (24, 20739),

Gene: Welcome\_47 Start: 20264, Stop: 20875, Start Num: 9

Candidate Starts for Welcome\_47:

(8, 20054), (Start: 9 @20264 has 20 MA's), (11, 20324), (18, 20528), (23, 20729), (24, 20756),

Gene: Yuma\_45 Start: 20175, Stop: 20786, Start Num: 9

Candidate Starts for Yuma\_45:

(8, 19965), (Start: 9 @20175 has 20 MA's), (11, 20235), (18, 20439), (23, 20640), (24, 20667),

Gene: Zooman\_200 Start: 118042, Stop: 118683, Start Num: 9

Candidate Starts for Zooman\_200:

(Start: 9 @118042 has 20 MA's), (10, 118081), (16, 118270), (21, 118507), (30, 118633),