

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 6624 Report

This analysis was run 04/05/24 on database version 557.

Pham number 6624 has 11 members, 2 are drafts.

Phages represented in each track:

Track 1 : RunningBrook\_12, DustyDino\_12

Track 2 : Musetta\_12

Track 3: Necrophoxinus\_12, Lyell\_12

Track 4 : Erenyeager\_9

Track 5 : StevieWelch\_12, Fork\_9

Track 6 : ASegato\_12Track 7 : Yuma\_12Track 8 : Welcome\_12

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

The start number called the most often in the published annotations is 10, it was called in 8 of the 9 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

• DustyDino\_12, Erenyeager\_9, Fork\_9, Lyell\_12, Musetta\_12, Necrophoxinus\_12, RunningBrook\_12, StevieWelch\_12, Welcome\_12, Yuma\_12,

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

ASegato\_12,

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

•

# Summary by start number:

#### Start 9:

- Found in 7 of 11 (63.6%) of genes in pham
- Manual Annotations of this start: 1 of 9
- Called 14.3% of time when present
- Phage (with cluster) where this start called: ASegato\_12 (ED2),

#### Start 10:

• Found in 11 of 11 (100.0%) of genes in pham

- Manual Annotations of this start: 8 of 9
- Called 90.9% of time when present
- Phage (with cluster) where this start called: DustyDino\_12 (ED2), Erenyeager\_9 (ED2), Fork\_9 (ED2), Lyell\_12 (ED2), Musetta\_12 (ED2), Necrophoxinus\_12 (ED2), RunningBrook\_12 (ED2), StevieWelch\_12 (ED2), Welcome\_12 (ED2), Yuma\_12 (ED2),

### **Summary by clusters:**

There is one cluster represented in this pham: ED2

Info for manual annotations of cluster ED2:

- •Start number 9 was manually annotated 1 time for cluster ED2.
- •Start number 10 was manually annotated 8 times for cluster ED2.

### Gene Information:

Gene: ASegato\_12 Start: 4336, Stop: 4659, Start Num: 9

Candidate Starts for ASegato\_12:

(Start: 9 @ 4336 has 1 MA's), (Start: 10 @ 4342 has 8 MA's), (11, 4366), (12, 4375), (13, 4417), (14, 4444), (16, 4468), (17, 4480), (18, 4486), (22, 4579),

Gene: DustyDino\_12 Start: 4379, Stop: 4678, Start Num: 10

Candidate Starts for DustyDino 12:

(1, 4166), (2, 4172), (3, 4238), (4, 4241), (5, 4316), (6, 4337), (7, 4367), (8, 4373), (Start: 10 @4379 has 8 MA's), (11, 4403), (12, 4412), (14, 4481), (15, 4484), (16, 4505), (17, 4517), (18, 4523), (20, 4556), (21, 4601), (23, 4619),

Gene: Erenyeager\_9 Start: 3750, Stop: 4049, Start Num: 10

Candidate Starts for Erenyeager\_9:

(Start: 9 @3744 has 1 MA's), (Start: 10 @3750 has 8 MA's), (11, 3774), (12, 3783), (14, 3852), (15, 3855), (16, 3876), (17, 3888), (18, 3894), (20, 3927), (21, 3972), (23, 3990),

Gene: Fork\_9 Start: 3644, Stop: 3943, Start Num: 10

Candidate Starts for Fork\_9:

(Start: 10 @3644 has 8 MA's), (11, 3668), (12, 3677), (17, 3782), (18, 3788), (23, 3881), (24, 3935),

Gene: Lyell 12 Start: 4094, Stop: 4393, Start Num: 10

Candidate Starts for Lyell 12:

(Start: 9 @ 4088 has 1 MA's), (Start: 10 @ 4094 has 8 MA's), (11, 4118), (12, 4127), (16, 4220), (17, 4232), (18, 4238), (20, 4271), (21, 4316), (23, 4334),

Gene: Musetta\_12 Start: 4354, Stop: 4653, Start Num: 10

Candidate Starts for Musetta\_12:

(Start: 9 @ 4348 has 1 MA's), (Start: 10 @ 4354 has 8 MA's), (11, 4378), (12, 4387), (14, 4456), (15, 4459), (16, 4480), (17, 4492), (18, 4498), (23, 4591), (24, 4645),

Gene: Necrophoxinus 12 Start: 4470, Stop: 4769, Start Num: 10

Candidate Starts for Necrophoxinus 12:

(Start: 9 @ 4464 has 1 MA's), (Start: 10 @ 4470 has 8 MA's), (11, 4494), (12, 4503), (16, 4596), (17, 4608), (18, 4614), (20, 4647), (21, 4692), (23, 4710),

Gene: RunningBrook\_12 Start: 4379, Stop: 4678, Start Num: 10

Candidate Starts for RunningBrook\_12:

(1, 4166), (2, 4172), (3, 4238), (4, 4241), (5, 4316), (6, 4337), (7, 4367), (8, 4373), (Start: 10 @4379 has 8 MA's), (11, 4403), (12, 4412), (14, 4481), (15, 4484), (16, 4505), (17, 4517), (18, 4523), (20, 4556), (21, 4601), (23, 4619),

Gene: StevieWelch\_12 Start: 4271, Stop: 4570, Start Num: 10

Candidate Starts for StevieWelch\_12:

(Start: 10 @4271 has 8 MA's), (11, 4295), (12, 4304), (17, 4409), (18, 4415), (23, 4508), (24, 4562),

Gene: Welcome\_12 Start: 4353, Stop: 4649, Start Num: 10

Candidate Starts for Welcome\_12:

(Start: 9 @ 4347 has 1 MA's), (Start: 10 @ 4353 has 8 MA's), (11, 4377), (12, 4386), (14, 4455), (16, 4479), (17, 4491), (18, 4497), (19, 4518), (20, 4530), (23, 4590),

Gene: Yuma\_12 Start: 4253, Stop: 4552, Start Num: 10

Candidate Starts for Yuma\_12:

(Start: 9 @ 4247 has 1 MA's), (Start: 10 @ 4253 has 8 MA's), (11, 4277), (12, 4286), (16, 4379), (17, 4391), (18, 4397), (23, 4490), (24, 4544),