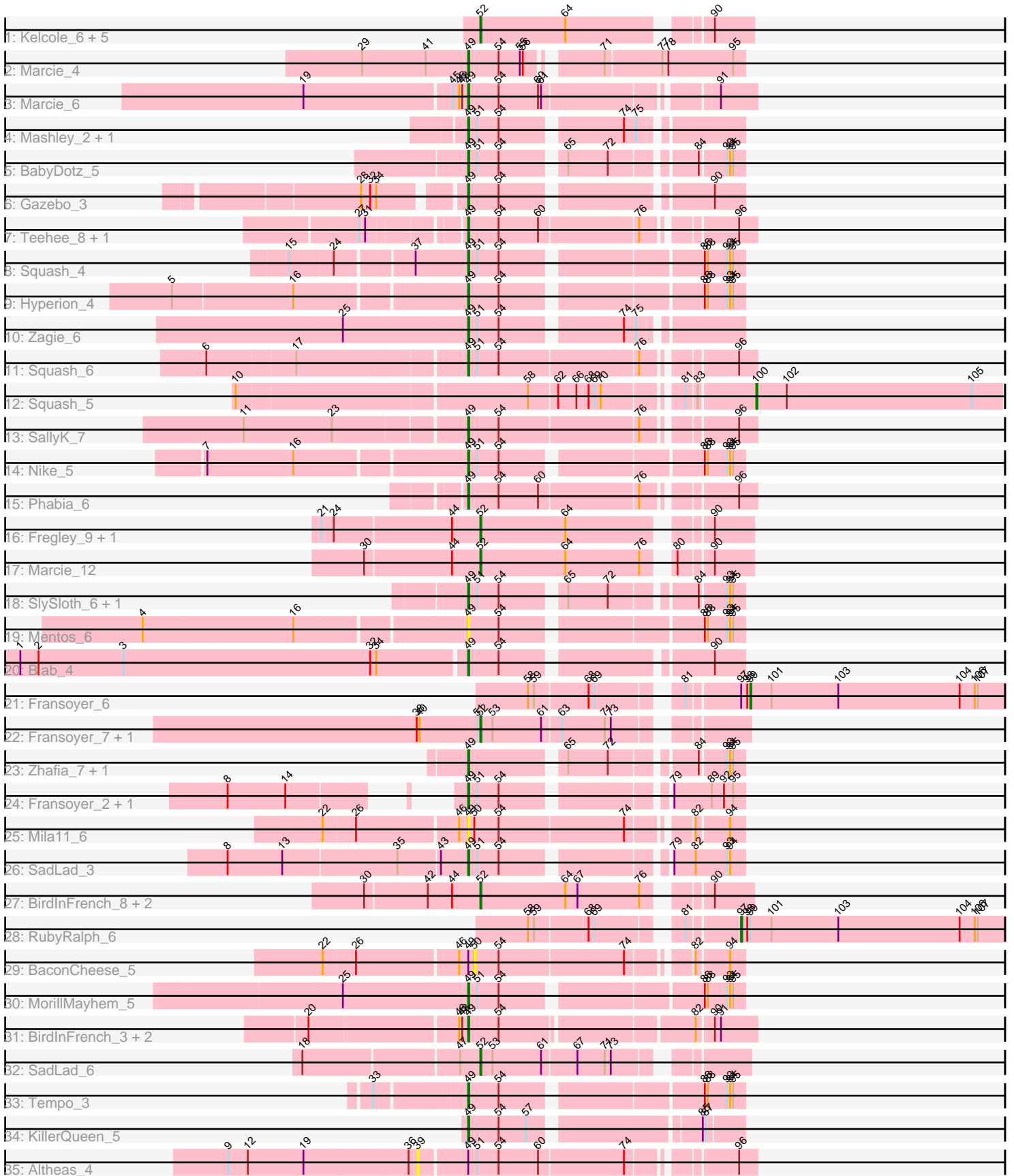


Pham 301457



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 301457 Report

This analysis was run 06/08/26 on database version 649.

Pham number 301457 has 51 members, 6 are drafts.

Phages represented in each track:

- Track 1 : Kelcole_6, OneinaGillian_7, RobinRose_8, KillerQueen_8, Tempo_7, Romm_8
- Track 2 : Marcie_4
- Track 3 : Marcie_6
- Track 4 : Mashley_2, AluminumJesus_2
- Track 5 : BabyDotz_5
- Track 6 : Gazebo_3
- Track 7 : Teehee_8, Jehoshaphat_8
- Track 8 : Squash_4
- Track 9 : Hyperion_4
- Track 10 : Zagie_6
- Track 11 : Squash_6
- Track 12 : Squash_5
- Track 13 : SallyK_7
- Track 14 : Nike_5
- Track 15 : Phabia_6
- Track 16 : Fregley_9, CandC_7
- Track 17 : Marcie_12
- Track 18 : SlySloth_6, Judebell_6
- Track 19 : Mentos_6
- Track 20 : Blab_4
- Track 21 : Fransoyer_6
- Track 22 : Fransoyer_7, RubyRalph_7
- Track 23 : Zhafia_7, Namago_4
- Track 24 : Fransoyer_2, RubyRalph_2
- Track 25 : Mila11_6
- Track 26 : SadLad_3
- Track 27 : BirdInFrench_8, Wilca_8, Pepe25_7
- Track 28 : RubyRalph_6
- Track 29 : BaconCheese_5
- Track 30 : MorillMayhem_5
- Track 31 : BirdInFrench_3, Wilca_3, Pepe25_2
- Track 32 : SadLad_6
- Track 33 : Tempo_3
- Track 34 : KillerQueen_5
- Track 35 : Altheas_4

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

The start number called the most often in the published annotations is 49, it was called in 28 of the 45 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- AluminumJesus_2, BabyDotz_5, BirdInFrench_3, Blab_4, Fransoyer_2, Gazebo_3, Hyperion_4, Jehoshaphat_8, Judebell_6, KillerQueen_5, Marcie_4, Marcie_6, Mashley_2, Mentos_6, Mila11_6, MorillMayhem_5, Namago_4, Nike_5, Pepe25_2, Phabia_6, RubyRalph_2, SadLad_3, SallyK_7, SlySloth_6, Squash_4, Squash_6, Teehee_8, Tempo_3, Wilca_3, Zagie_6, Zhafia_7,

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

- Altheas_4, BaconCheese_5,

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

- BirdInFrench_8, CandC_7, Fransoyer_6, Fransoyer_7, Fregley_9, Kelcole_6, KillerQueen_8, Marcie_12, OneinaGillian_7, Pepe25_7, RobinRose_8, Romm_8, RubyRalph_6, RubyRalph_7, SadLad_6, Squash_5, Tempo_7, Wilca_8,

Summary by start number:

Start 39:

- Found in 1 of 51 (2.0%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Altheas_4 (EG),

Start 49:

- Found in 33 of 51 (64.7%) of genes in pham
- Manual Annotations of this start: 28 of 45
- Called 93.9% of time when present
- Phage (with cluster) where this start called: AluminumJesus_2 (EG), BabyDotz_5 (EG), BirdInFrench_3 (EG), Blab_4 (EG), Fransoyer_2 (EG), Gazebo_3 (EG), Hyperion_4 (EG), Jehoshaphat_8 (EG), Judebell_6 (EG), KillerQueen_5 (EG), Marcie_4 (EG), Marcie_6 (EG), Mashley_2 (EG), Mentos_6 (EG), Mila11_6 (EG), MorillMayhem_5 (EG), Namago_4 (EG), Nike_5 (EG), Pepe25_2 (EG), Phabia_6 (EG), RubyRalph_2 (EG), SadLad_3 (EG), SallyK_7 (EG), SlySloth_6 (EG), Squash_4 (EG), Squash_6 (EG), Teehee_8 (EG), Tempo_3 (EG), Wilca_3 (EG), Zagie_6 (EG), Zhafia_7 (EG),

Start 50:

- Found in 2 of 51 (3.9%) of genes in pham
- No Manual Annotations of this start.
- Called 50.0% of time when present
- Phage (with cluster) where this start called: BaconCheese_5 (EG),

Start 52:

- Found in 15 of 51 (29.4%) of genes in pham
- Manual Annotations of this start: 14 of 45

- Called 100.0% of time when present
- Phage (with cluster) where this start called: BirdInFrench_8 (EG), CandC_7 (EG), Fransoyer_7 (EG), Fregley_9 (EG), Kelcole_6 (EG), KillerQueen_8 (EG), Marcie_12 (EG), OneinaGillian_7 (EG), Pepe25_7 (EG), RobinRose_8 (EG), Romm_8 (EG), RubyRalph_7 (EG), SadLad_6 (EG), Tempo_7 (EG), Wilca_8 (EG),

Start 97:

- Found in 2 of 51 (3.9%) of genes in pham
- Manual Annotations of this start: 1 of 45
- Called 50.0% of time when present
- Phage (with cluster) where this start called: RubyRalph_6 (EG),

Start 99:

- Found in 2 of 51 (3.9%) of genes in pham
- Manual Annotations of this start: 1 of 45
- Called 50.0% of time when present
- Phage (with cluster) where this start called: Fransoyer_6 (EG),

Start 100:

- Found in 1 of 51 (2.0%) of genes in pham
- Manual Annotations of this start: 1 of 45
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Squash_5 (EG),

Summary by clusters:

There is one cluster represented in this pham: EG

Info for manual annotations of cluster EG:

- Start number 49 was manually annotated 28 times for cluster EG.
- Start number 52 was manually annotated 14 times for cluster EG.
- Start number 97 was manually annotated 1 time for cluster EG.
- Start number 99 was manually annotated 1 time for cluster EG.
- Start number 100 was manually annotated 1 time for cluster EG.

Gene Information:

Gene: Altheas_4 Start: 1637, Stop: 1335, Start Num: 39

Candidate Starts for Altheas_4:

(9, 1820), (12, 1802), (19, 1748), (36, 1646), (39, 1637), (Start: 49 @1592 has 28 MA's), (51, 1583), (54, 1562), (60, 1523), (74, 1442), (96, 1352),

Gene: AluminumJesus_2 Start: 1146, Stop: 907, Start Num: 49

Candidate Starts for AluminumJesus_2:

(Start: 49 @1146 has 28 MA's), (51, 1137), (54, 1116), (74, 1008), (75, 996),

Gene: BabyDotz_5 Start: 2093, Stop: 1857, Start Num: 49

Candidate Starts for BabyDotz_5:

(Start: 49 @2093 has 28 MA's), (51, 2084), (54, 2063), (65, 2009), (72, 1970), (84, 1898), (93, 1874), (94, 1871), (95, 1868),

Gene: BaconCheese_5 Start: 1813, Stop: 1574, Start Num: 50

Candidate Starts for BaconCheese_5:

(22, 1954), (26, 1924), (46, 1828), (Start: 49 @1819 has 28 MA's), (50, 1813), (54, 1789), (74, 1669), (82, 1618), (94, 1588),

Gene: BirdInFrench_8 Start: 2337, Stop: 2095, Start Num: 52

Candidate Starts for BirdInFrench_8:

(30, 2448), (42, 2388), (44, 2364), (Start: 52 @2337 has 14 MA's), (64, 2253), (67, 2241), (76, 2181), (90, 2133),

Gene: BirdInFrench_3 Start: 1383, Stop: 1120, Start Num: 49

Candidate Starts for BirdInFrench_3:

(20, 1533), (46, 1392), (48, 1389), (Start: 49 @1383 has 28 MA's), (54, 1353), (82, 1176), (90, 1161), (91, 1155),

Gene: Blab_4 Start: 1367, Stop: 1125, Start Num: 49

Candidate Starts for Blab_4:

(1, 1802), (2, 1784), (3, 1700), (32, 1457), (34, 1451), (Start: 49 @1367 has 28 MA's), (54, 1337), (90, 1154),

Gene: CandC_7 Start: 2104, Stop: 1862, Start Num: 52

Candidate Starts for CandC_7:

(21, 2257), (24, 2245), (44, 2131), (Start: 52 @2104 has 14 MA's), (64, 2020), (90, 1900),

Gene: Fransoyer_6 Start: 2120, Stop: 1869, Start Num: 99

Candidate Starts for Fransoyer_6:

(58, 2306), (59, 2300), (68, 2249), (69, 2243), (81, 2177), (Start: 97 @2129 has 1 MA's), (98, 2123), (Start: 99 @2120 has 1 MA's), (101, 2099), (103, 2033), (104, 1913), (106, 1898), (107, 1895),

Gene: Fransoyer_7 Start: 2353, Stop: 2120, Start Num: 52

Candidate Starts for Fransoyer_7:

(38, 2416), (40, 2413), (51, 2356), (Start: 52 @2353 has 14 MA's), (53, 2341), (61, 2293), (63, 2275), (71, 2233), (73, 2227),

Gene: Fransoyer_2 Start: 1080, Stop: 841, Start Num: 49

Candidate Starts for Fransoyer_2:

(8, 1230), (14, 1173), (Start: 49 @1080 has 28 MA's), (51, 1071), (54, 1050), (79, 909), (89, 873), (92, 861), (95, 852),

Gene: Fregley_9 Start: 2642, Stop: 2400, Start Num: 52

Candidate Starts for Fregley_9:

(21, 2795), (24, 2783), (44, 2669), (Start: 52 @2642 has 14 MA's), (64, 2558), (90, 2438),

Gene: Gazebo_3 Start: 1551, Stop: 1309, Start Num: 49

Candidate Starts for Gazebo_3:

(28, 1638), (32, 1629), (34, 1623), (Start: 49 @1551 has 28 MA's), (54, 1521), (90, 1338),

Gene: Hyperion_4 Start: 1519, Stop: 1271, Start Num: 49

Candidate Starts for Hyperion_4:

(5, 1795), (16, 1678), (Start: 49 @1519 has 28 MA's), (54, 1489), (86, 1309), (88, 1306), (93, 1288), (94, 1285), (95, 1282),

Gene: Jehoshaphat_8 Start: 2791, Stop: 2534, Start Num: 49

Candidate Starts for Jehoshaphat_8:

(27, 2881), (31, 2875), (Start: 49 @2791 has 28 MA's), (54, 2761), (60, 2722), (76, 2629), (96, 2551),

Gene: Judebell_6 Start: 2078, Stop: 1842, Start Num: 49

Candidate Starts for Judebell_6:

(Start: 49 @2078 has 28 MA's), (51, 2069), (54, 2048), (65, 1994), (72, 1955), (84, 1883), (93, 1859), (94, 1856), (95, 1853),

Gene: Kelcole_6 Start: 2251, Stop: 2009, Start Num: 52

Candidate Starts for Kelcole_6:

(Start: 52 @2251 has 14 MA's), (64, 2167), (90, 2047),

Gene: KillerQueen_8 Start: 2064, Stop: 1822, Start Num: 52

Candidate Starts for KillerQueen_8:

(Start: 52 @2064 has 14 MA's), (64, 1980), (90, 1860),

Gene: KillerQueen_5 Start: 1627, Stop: 1382, Start Num: 49

Candidate Starts for KillerQueen_5:

(Start: 49 @1627 has 28 MA's), (54, 1597), (57, 1570), (85, 1420), (87, 1417),

Gene: Marcie_4 Start: 1305, Stop: 1057, Start Num: 49

Candidate Starts for Marcie_4:

(29, 1410), (41, 1347), (Start: 49 @1305 has 28 MA's), (54, 1275), (55, 1254), (56, 1251), (71, 1191), (77, 1137), (78, 1131), (95, 1068),

Gene: Marcie_6 Start: 1750, Stop: 1493, Start Num: 49

Candidate Starts for Marcie_6:

(19, 1906), (45, 1765), (46, 1759), (48, 1756), (Start: 49 @1750 has 28 MA's), (54, 1720), (60, 1681), (61, 1678), (91, 1528),

Gene: Marcie_12 Start: 2904, Stop: 2662, Start Num: 52

Candidate Starts for Marcie_12:

(30, 3015), (44, 2931), (Start: 52 @2904 has 14 MA's), (64, 2820), (76, 2748), (80, 2730), (90, 2700),

Gene: Mashley_2 Start: 1146, Stop: 907, Start Num: 49

Candidate Starts for Mashley_2:

(Start: 49 @1146 has 28 MA's), (51, 1137), (54, 1116), (74, 1008), (75, 996),

Gene: Mentos_6 Start: 1855, Stop: 1607, Start Num: 49

Candidate Starts for Mentos_6:

(4, 2161), (16, 2014), (Start: 49 @1855 has 28 MA's), (54, 1825), (86, 1645), (88, 1642), (93, 1624), (94, 1621), (95, 1618),

Gene: Mila11_6 Start: 1804, Stop: 1559, Start Num: 49

Candidate Starts for Mila11_6:

(22, 1939), (26, 1909), (46, 1813), (Start: 49 @1804 has 28 MA's), (50, 1798), (54, 1774), (74, 1654), (82, 1603), (94, 1573),

Gene: MorillMayhem_5 Start: 1824, Stop: 1576, Start Num: 49

Candidate Starts for MorillMayhem_5:

(25, 1947), (Start: 49 @1824 has 28 MA's), (51, 1815), (54, 1794), (86, 1614), (88, 1611), (93, 1593), (94, 1590), (95, 1587),

Gene: Namago_4 Start: 1406, Stop: 1170, Start Num: 49
Candidate Starts for Namago_4:
(Start: 49 @1406 has 28 MA's), (65, 1322), (72, 1283), (84, 1211), (93, 1187), (94, 1184), (95, 1181),

Gene: Nike_5 Start: 1873, Stop: 1625, Start Num: 49
Candidate Starts for Nike_5:
(7, 2116), (16, 2032), (Start: 49 @1873 has 28 MA's), (51, 1864), (54, 1843), (86, 1663), (88, 1660),
(93, 1642), (94, 1639), (95, 1636),

Gene: OneinaGillian_7 Start: 1891, Stop: 1649, Start Num: 52
Candidate Starts for OneinaGillian_7:
(Start: 52 @1891 has 14 MA's), (64, 1807), (90, 1687),

Gene: Pepe25_2 Start: 1383, Stop: 1120, Start Num: 49
Candidate Starts for Pepe25_2:
(20, 1533), (46, 1392), (48, 1389), (Start: 49 @1383 has 28 MA's), (54, 1353), (82, 1176), (90, 1161),
(91, 1155),

Gene: Pepe25_7 Start: 2337, Stop: 2095, Start Num: 52
Candidate Starts for Pepe25_7:
(30, 2448), (42, 2388), (44, 2364), (Start: 52 @2337 has 14 MA's), (64, 2253), (67, 2241), (76, 2181),
(90, 2133),

Gene: Phabia_6 Start: 1993, Stop: 1736, Start Num: 49
Candidate Starts for Phabia_6:
(Start: 49 @1993 has 28 MA's), (54, 1963), (60, 1924), (76, 1831), (96, 1753),

Gene: RobinRose_8 Start: 2080, Stop: 1838, Start Num: 52
Candidate Starts for RobinRose_8:
(Start: 52 @2080 has 14 MA's), (64, 1996), (90, 1876),

Gene: Romm_8 Start: 2080, Stop: 1838, Start Num: 52
Candidate Starts for Romm_8:
(Start: 52 @2080 has 14 MA's), (64, 1996), (90, 1876),

Gene: RubyRalph_6 Start: 2129, Stop: 1869, Start Num: 97
Candidate Starts for RubyRalph_6:
(58, 2306), (59, 2300), (68, 2249), (69, 2243), (81, 2177), (Start: 97 @2129 has 1 MA's), (98, 2123),
(Start: 99 @2120 has 1 MA's), (101, 2099), (103, 2033), (104, 1913), (106, 1898), (107, 1895),

Gene: RubyRalph_2 Start: 1080, Stop: 841, Start Num: 49
Candidate Starts for RubyRalph_2:
(8, 1230), (14, 1173), (Start: 49 @1080 has 28 MA's), (51, 1071), (54, 1050), (79, 909), (89, 873), (92,
861), (95, 852),

Gene: RubyRalph_7 Start: 2353, Stop: 2120, Start Num: 52
Candidate Starts for RubyRalph_7:
(38, 2416), (40, 2413), (51, 2356), (Start: 52 @2353 has 14 MA's), (53, 2341), (61, 2293), (63, 2275),
(71, 2233), (73, 2227),

Gene: SadLad_3 Start: 1311, Stop: 1072, Start Num: 49
Candidate Starts for SadLad_3:

(8, 1542), (13, 1488), (35, 1377), (43, 1338), (Start: 49 @1311 has 28 MA's), (51, 1302), (54, 1281), (79, 1140), (82, 1119), (93, 1089), (94, 1086),

Gene: SadLad_6 Start: 2142, Stop: 1909, Start Num: 52

Candidate Starts for SadLad_6:

(18, 2304), (47, 2160), (Start: 52 @2142 has 14 MA's), (53, 2130), (61, 2082), (67, 2049), (71, 2022), (73, 2016),

Gene: SallyK_7 Start: 2695, Stop: 2438, Start Num: 49

Candidate Starts for SallyK_7:

(11, 2902), (23, 2818), (Start: 49 @2695 has 28 MA's), (54, 2665), (76, 2533), (96, 2455),

Gene: SlySloth_6 Start: 2096, Stop: 1860, Start Num: 49

Candidate Starts for SlySloth_6:

(Start: 49 @2096 has 28 MA's), (51, 2087), (54, 2066), (65, 2012), (72, 1973), (84, 1901), (93, 1877), (94, 1874), (95, 1871),

Gene: Squash_4 Start: 1432, Stop: 1184, Start Num: 49

Candidate Starts for Squash_4:

(15, 1597), (24, 1555), (37, 1483), (Start: 49 @1432 has 28 MA's), (51, 1423), (54, 1402), (86, 1222), (88, 1219), (93, 1201), (94, 1198), (95, 1195),

Gene: Squash_6 Start: 1928, Stop: 1671, Start Num: 49

Candidate Starts for Squash_6:

(6, 2171), (17, 2087), (Start: 49 @1928 has 28 MA's), (51, 1919), (54, 1898), (76, 1766), (96, 1688),

Gene: Squash_5 Start: 1671, Stop: 1429, Start Num: 100

Candidate Starts for Squash_5:

(10, 2142), (58, 1869), (62, 1842), (66, 1824), (68, 1812), (69, 1806), (70, 1800), (81, 1734), (83, 1725), (Start: 100 @1671 has 1 MA's), (102, 1641), (105, 1458),

Gene: Teehee_8 Start: 2791, Stop: 2534, Start Num: 49

Candidate Starts for Teehee_8:

(27, 2881), (31, 2875), (Start: 49 @2791 has 28 MA's), (54, 2761), (60, 2722), (76, 2629), (96, 2551),

Gene: Tempo_7 Start: 2272, Stop: 2030, Start Num: 52

Candidate Starts for Tempo_7:

(Start: 52 @2272 has 14 MA's), (64, 2188), (90, 2068),

Gene: Tempo_3 Start: 1126, Stop: 878, Start Num: 49

Candidate Starts for Tempo_3:

(33, 1210), (Start: 49 @1126 has 28 MA's), (54, 1096), (86, 916), (88, 913), (93, 895), (94, 892), (95, 889),

Gene: Wilca_3 Start: 1383, Stop: 1120, Start Num: 49

Candidate Starts for Wilca_3:

(20, 1533), (46, 1392), (48, 1389), (Start: 49 @1383 has 28 MA's), (54, 1353), (82, 1176), (90, 1161), (91, 1155),

Gene: Wilca_8 Start: 2337, Stop: 2095, Start Num: 52

Candidate Starts for Wilca_8:

(30, 2448), (42, 2388), (44, 2364), (Start: 52 @2337 has 14 MA's), (64, 2253), (67, 2241), (76, 2181), (90, 2133),

Gene: Zagie_6 Start: 2057, Stop: 1818, Start Num: 49

Candidate Starts for Zagie_6:

(25, 2180), (Start: 49 @2057 has 28 MA's), (51, 2048), (54, 2027), (74, 1919), (75, 1907),

Gene: Zhafia_7 Start: 2076, Stop: 1840, Start Num: 49

Candidate Starts for Zhafia_7:

(Start: 49 @2076 has 28 MA's), (65, 1992), (72, 1953), (84, 1881), (93, 1857), (94, 1854), (95, 1851),