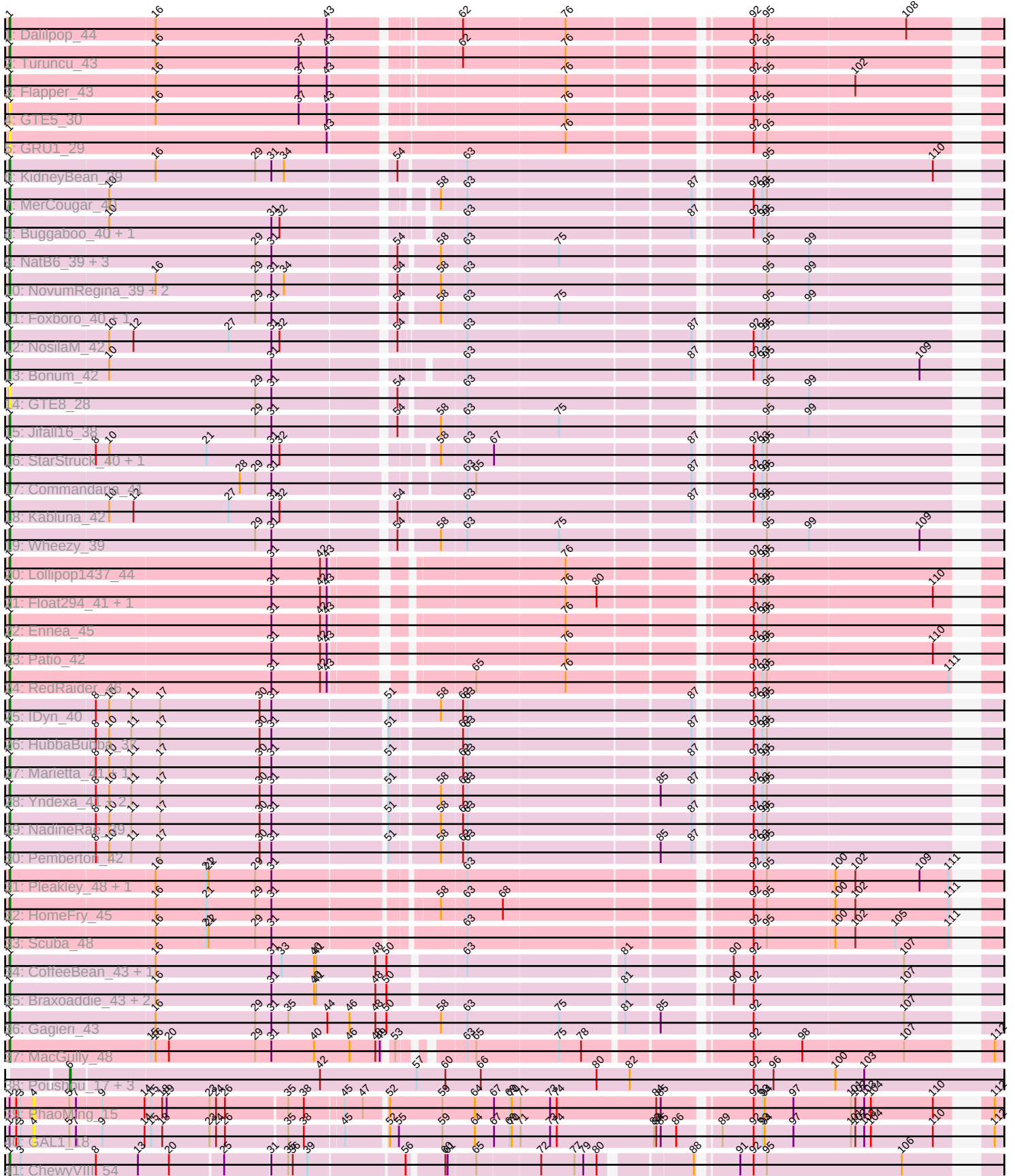


Zoomed Pham 330880



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 330880 Report

This analysis was run 09/05/26 on database version 662.

Pham number 330880 has 60 members, 5 are drafts.

Phages represented in each track:

- Track 1 : Dalilpop_44
- Track 2 : Turuncu_43
- Track 3 : Flapper_43
- Track 4 : GTE5_30
- Track 5 : GRU1_29
- Track 6 : KidneyBean_39
- Track 7 : MerCougar_40
- Track 8 : Buggaboo_40, SuperSulley_40
- Track 9 : NatB6_39, Kurt_39, Phomeo_38, Emianna_39
- Track 10 : NovumRegina_39, Arti_39, GrootJr_41
- Track 11 : Foxboro_40, Tracker_39
- Track 12 : NosilaM_42
- Track 13 : Bonum_42
- Track 14 : GTE8_28
- Track 15 : Jifall16_38
- Track 16 : StarStruck_40, Outis_40
- Track 17 : Commandaria_41
- Track 18 : Kabluna_42
- Track 19 : Wheezy_39
- Track 20 : Lollipop1437_44
- Track 21 : Float294_41, Skysand_41
- Track 22 : Ennea_45
- Track 23 : Patio_42
- Track 24 : RedRaider_46
- Track 25 : IDyn_40
- Track 26 : HubbaBubba_37
- Track 27 : Marietta_41, WhoseManz_41
- Track 28 : Yndexa_41, BiPauneto_42, Sukkupi_41
- Track 29 : NadineRae_39
- Track 30 : Pemberton_42
- Track 31 : Pleakley_48, Fury_48
- Track 32 : HomeFry_45
- Track 33 : Scuba_48
- Track 34 : CoffeeBean_43, Maselop_43
- Track 35 : Braxoaddie_43, Polyyuki_43, Apiary_43
- Track 36 : Gagieri_43
- Track 37 : MacGully_48

- Track 38 : Poushou_17, Arianna_17, TouchMeNot_17, Colleen_17
- Track 39 : PhaoMing_15
- Track 40 : GAL1_18
- Track 41 : ChewyVIII_54

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

The start number called the most often in the published annotations is 1, it was called in 51 of the 55 non-draft genes in the pham.

Genes that call this "Most Annotated" start:

- Apiary_43, Arti_39, BiPauneto_42, Bonum_42, Braxoaddie_43, Buggaboo_40, ChewyVIII_54, CoffeeBean_43, Commandaria_41, Dalilpop_44, Emianna_39, Ennea_45, Flapper_43, Float294_41, Foxboro_40, Fury_48, GRU1_29, GTE5_30, GTE8_28, Gagieri_43, GrootJr_41, HomeFry_45, HubbaBubba_37, IDyn_40, Jifall16_38, Kabluna_42, KidneyBean_39, Kurt_39, Lollipop1437_44, MacGully_48, Marietta_41, Maselop_43, MerCougar_40, NadineRae_39, NatB6_39, NosilaM_42, NovumRegina_39, Outis_40, Patio_42, Pemberton_42, Phomeo_38, Pleakley_48, Polyyuki_43, RedRaider_46, Scuba_48, Skysand_41, StarStruck_40, Sukkupi_41, SuperSulley_40, Tracker_39, Turuncu_43, Wheezy_39, WhoseManz_41, Yndexa_41,

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

- GAL1_18, PhaoMing_15,

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

- Arianna_17, Colleen_17, Poushou_17, TouchMeNot_17,

Summary by start number:

Start 1:

- Found in 56 of 60 (93.3%) of genes in pham
- Manual Annotations of this start: 51 of 55
- Called 96.4% of time when present
- Phage (with cluster) where this start called: Apiary_43 (CR6), Arti_39 (CR2), BiPauneto_42 (CR4), Bonum_42 (CR2), Braxoaddie_43 (CR6), Buggaboo_40 (CR2), ChewyVIII_54 (singleton), CoffeeBean_43 (CR6), Commandaria_41 (CR2), Dalilpop_44 (CR1), Emianna_39 (CR2), Ennea_45 (CR3), Flapper_43 (CR1), Float294_41 (CR3), Foxboro_40 (CR2), Fury_48 (CR5), GRU1_29 (CR1), GTE5_30 (CR1), GTE8_28 (CR2), Gagieri_43 (CR6), GrootJr_41 (CR2), HomeFry_45 (CR5), HubbaBubba_37 (CR4), IDyn_40 (CR4), Jifall16_38 (CR2), Kabluna_42 (CR2), KidneyBean_39 (CR2), Kurt_39 (CR2), Lollipop1437_44 (CR3), MacGully_48 (CR7), Marietta_41 (CR4), Maselop_43 (CR6), MerCougar_40 (CR2), NadineRae_39 (CR4), NatB6_39 (CR2), NosilaM_42 (CR2), NovumRegina_39 (CR2), Outis_40 (CR2), Patio_42 (CR3), Pemberton_42 (CR4), Phomeo_38 (CR2), Pleakley_48 (CR5), Polyyuki_43 (CR6), RedRaider_46 (CR3), Scuba_48 (CR5), Skysand_41 (CR3), StarStruck_40 (CR2), Sukkupi_41 (CR4), SuperSulley_40 (CR2), Tracker_39 (CR2), Turuncu_43 (CR1), Wheezy_39 (CR2), WhoseManz_41 (CR4), Yndexa_41 (CR4),

Start 4:

- Found in 2 of 60 (3.3%) of genes in pham
- No Manual Annotations of this start.
- Called 100.0% of time when present
- Phage (with cluster) where this start called: GAL1_18 (singleton), PhaoMing_15 (UNK),

Start 6:

- Found in 4 of 60 (6.7%) of genes in pham
- Manual Annotations of this start: 4 of 55
- Called 100.0% of time when present
- Phage (with cluster) where this start called: Arianna_17 (EO), Colleen_17 (EO), Poushou_17 (EO), TouchMeNot_17 (EO),

Summary by clusters:

There are 10 clusters represented in this pham: CR2, CR3, EO, CR1, CR6, CR7, CR4, CR5, singleton, UNK,

Info for manual annotations of cluster CR1:

- Start number 1 was manually annotated 3 times for cluster CR1.

Info for manual annotations of cluster CR2:

- Start number 1 was manually annotated 21 times for cluster CR2.

Info for manual annotations of cluster CR3:

- Start number 1 was manually annotated 6 times for cluster CR3.

Info for manual annotations of cluster CR4:

- Start number 1 was manually annotated 9 times for cluster CR4.

Info for manual annotations of cluster CR5:

- Start number 1 was manually annotated 4 times for cluster CR5.

Info for manual annotations of cluster CR6:

- Start number 1 was manually annotated 6 times for cluster CR6.

Info for manual annotations of cluster CR7:

- Start number 1 was manually annotated 1 time for cluster CR7.

Info for manual annotations of cluster EO:

- Start number 6 was manually annotated 4 times for cluster EO.

Gene Information:

Gene: Apiary_43 Start: 25209, Stop: 30419, Start Num: 1

Candidate Starts for Apiary_43:

(Start: 1 @25209 has 51 MA's), (16, 25401), (31, 25557), (40, 25611), (41, 25614), (48, 25692), (50, 25707), (81, 25998), (90, 26118), (92, 26145), (107, 26343), (119, 26520), (121, 26562), (125, 26640), (127, 26646), (135, 26718), (136, 26730), (137, 26736), (142, 26757), (148, 26796), (157, 26853), (162, 26895), (163, 26904), (168, 26937), (169, 26955), (171, 26985), (185, 27111), (188, 27144),

(192, 27177), (196, 27207), (202, 27255), (203, 27264), (209, 27318), (219, 27390), (220, 27411), (222, 27420), (244, 27576), (252, 27627), (261, 27675), (266, 27708), (272, 27747), (273, 27750), (283, 27801), (284, 27804), (289, 27837), (299, 27879), (303, 27891), (304, 27894), (306, 27903), (314, 27945), (315, 27948), (317, 27954), (320, 27966), (329, 28020), (331, 28032), (350, 28209), (351, 28218), (353, 28221), (361, 28266), (370, 28356), (374, 28374), (395, 28539), (399, 28569), (400, 28584), (417, 28740), (424, 28752), (428, 28776), (436, 28830), (438, 28863), (442, 28908), (453, 29001), (454, 29010), (456, 29022), (458, 29031), (461, 29052), (462, 29055), (469, 29127), (470, 29130), (473, 29151), (478, 29193), (494, 29343), (497, 29376), (498, 29385), (520, 29622), (525, 29667), (537, 29733), (539, 29739), (540, 29760), (541, 29769), (543, 29790), (547, 29811), (551, 29856), (558, 29997), (578, 30186), (579, 30219), (587, 30321), (588, 30333), (592, 30360),

Gene: Arianna_17 Start: 11629, Stop: 16536, Start Num: 6

Candidate Starts for Arianna_17:

(Start: 6 @11629 has 4 MA's), (42, 11956), (57, 12085), (60, 12124), (66, 12172), (80, 12325), (82, 12370), (92, 12538), (96, 12565), (100, 12649), (103, 12688), (114, 12898), (119, 12961), (121, 13003), (128, 13090), (129, 13099), (131, 13111), (138, 13180), (142, 13198), (144, 13207), (145, 13216), (152, 13270), (155, 13285), (167, 13369), (172, 13429), (175, 13447), (180, 13525), (181, 13534), (183, 13543), (184, 13546), (189, 13606), (192, 13618), (193, 13630), (194, 13639), (211, 13771), (239, 13918), (242, 13936), (246, 13966), (251, 14002), (252, 14008), (255, 14038), (263, 14062), (268, 14065), (283, 14140), (285, 14149), (288, 14170), (289, 14173), (291, 14179), (296, 14203), (297, 14206), (305, 14221), (307, 14233), (312, 14254), (313, 14266), (317, 14278), (319, 14287), (339, 14386), (341, 14398), (343, 14419), (348, 14485), (362, 14575), (365, 14596), (377, 14701), (409, 14980), (425, 15115), (429, 15151), (440, 15253), (443, 15283), (448, 15325), (457, 15403), (475, 15565), (487, 15661), (502, 15802), (506, 15844), (508, 15865), (526, 16063), (528, 16087), (535, 16135), (553, 16384), (557, 16417), (561, 16480), (565, 16513), (567, 16522),

Gene: Arti_39 Start: 23467, Stop: 28866, Start Num: 1

Candidate Starts for Arti_39:

(Start: 1 @23467 has 51 MA's), (16, 23659), (29, 23794), (31, 23815), (34, 23830), (54, 23959), (58, 24010), (63, 24043), (95, 24412), (99, 24469), (114, 24706), (117, 24736), (119, 24769), (125, 24889), (131, 24919), (143, 25009), (148, 25045), (155, 25093), (156, 25099), (160, 25123), (162, 25144), (163, 25153), (169, 25204), (171, 25234), (207, 25534), (210, 25576), (211, 25579), (219, 25639), (222, 25669), (248, 25807), (250, 25825), (253, 25852), (257, 25873), (258, 25879), (266, 25918), (267, 25921), (279, 25981), (282, 25993), (284, 26002), (294, 26053), (297, 26068), (327, 26206), (329, 26218), (338, 26293), (346, 26380), (360, 26485), (363, 26497), (371, 26590), (376, 26614), (379, 26662), (381, 26677), (385, 26698), (386, 26722), (387, 26731), (388, 26740), (390, 26746), (394, 26782), (398, 26809), (408, 26902), (419, 27010), (427, 27061), (430, 27085), (435, 27112), (437, 27145), (441, 27178), (445, 27235), (449, 27262), (451, 27277), (456, 27334), (464, 27400), (474, 27484), (485, 27592), (486, 27595), (488, 27625), (554, 28399), (559, 28438), (566, 28525), (578, 28633), (582, 28720), (585, 28744), (587, 28768), (590, 28798), (592, 28807),

Gene: BiPauneto_42 Start: 23233, Stop: 28638, Start Num: 1

Candidate Starts for BiPauneto_42:

(Start: 1 @23233 has 51 MA's), (8, 23344), (10, 23362), (11, 23392), (17, 23431), (30, 23566), (31, 23581), (51, 23719), (58, 23779), (62, 23806), (63, 23812), (85, 24058), (87, 24100), (92, 24163), (93, 24175), (95, 24181), (113, 24463), (119, 24538), (124, 24646), (131, 24688), (140, 24769), (148, 24814), (155, 24862), (160, 24892), (163, 24922), (169, 24973), (171, 25003), (189, 25183), (191, 25189), (192, 25195), (207, 25303), (211, 25348), (212, 25354), (223, 25444), (240, 25519), (250, 25594), (253, 25621), (257, 25642), (263, 25660), (266, 25687), (289, 25804), (293, 25816), (300, 25849), (302, 25855), (307, 25876), (311, 25891), (313, 25909), (320, 25933), (321, 25942), (334, 26020), (337, 26053), (344, 26122), (350, 26188), (371, 26359), (379, 26431), (381, 26446), (386, 26491), (387, 26500), (388, 26509), (404, 26632), (408, 26671), (412, 26707), (419, 26779), (420, 26782), (427, 26830), (430, 26854), (434, 26878), (435, 26881), (437, 26914), (441, 26947), (444,

27004), (445, 27007), (451, 27049), (456, 27106), (459, 27118), (464, 27172), (466, 27187), (472, 27238), (474, 27256), (477, 27280), (480, 27316), (485, 27376), (486, 27379), (488, 27409), (490, 27430), (509, 27640), (516, 27751), (559, 28210), (561, 28252), (582, 28492), (588, 28552), (590, 28570), (592, 28579),

Gene: Bonum_42 Start: 23809, Stop: 29223, Start Num: 1

Candidate Starts for Bonum_42:

(Start: 1 @23809 has 51 MA's), (10, 23938), (31, 24157), (63, 24370), (87, 24658), (92, 24721), (93, 24733), (95, 24739), (109, 24940), (114, 25033), (117, 25063), (119, 25096), (125, 25216), (131, 25246), (132, 25249), (143, 25336), (148, 25372), (155, 25420), (160, 25450), (161, 25459), (162, 25471), (163, 25480), (169, 25531), (171, 25561), (200, 25804), (202, 25831), (203, 25840), (207, 25861), (211, 25906), (219, 25966), (221, 25990), (223, 26002), (253, 26179), (263, 26218), (265, 26239), (269, 26263), (279, 26308), (284, 26329), (285, 26335), (293, 26374), (294, 26380), (298, 26401), (303, 26416), (308, 26437), (316, 26476), (320, 26491), (321, 26500), (323, 26509), (326, 26521), (330, 26551), (331, 26557), (332, 26560), (337, 26611), (341, 26635), (344, 26677), (345, 26689), (360, 26809), (363, 26821), (366, 26881), (371, 26914), (375, 26932), (376, 26938), (379, 26986), (381, 27001), (382, 27010), (383, 27013), (386, 27046), (387, 27055), (388, 27064), (389, 27067), (390, 27070), (408, 27226), (419, 27334), (420, 27337), (427, 27385), (430, 27409), (435, 27436), (437, 27469), (441, 27502), (445, 27559), (451, 27601), (456, 27658), (465, 27736), (474, 27808), (477, 27832), (480, 27865), (482, 27874), (485, 27916), (486, 27919), (488, 27949), (489, 27961), (496, 28021), (524, 28375), (550, 28609), (555, 28762), (559, 28795), (561, 28837), (567, 28888), (582, 29077), (587, 29125), (590, 29155), (592, 29164), (594, 29188),

Gene: Braxoaddie_43 Start: 25198, Stop: 30408, Start Num: 1

Candidate Starts for Braxoaddie_43:

(Start: 1 @25198 has 51 MA's), (16, 25390), (31, 25546), (40, 25600), (41, 25603), (48, 25681), (50, 25696), (81, 25987), (90, 26107), (92, 26134), (107, 26332), (119, 26509), (121, 26551), (125, 26629), (127, 26635), (135, 26707), (136, 26719), (137, 26725), (142, 26746), (148, 26785), (157, 26842), (162, 26884), (163, 26893), (168, 26926), (169, 26944), (171, 26974), (185, 27100), (188, 27133), (192, 27166), (196, 27196), (202, 27244), (203, 27253), (209, 27307), (219, 27379), (220, 27400), (222, 27409), (244, 27565), (252, 27616), (261, 27664), (266, 27697), (272, 27736), (273, 27739), (283, 27790), (284, 27793), (289, 27826), (299, 27868), (303, 27880), (304, 27883), (306, 27892), (314, 27934), (315, 27937), (317, 27943), (320, 27955), (329, 28009), (331, 28021), (350, 28198), (351, 28207), (353, 28210), (361, 28255), (370, 28345), (374, 28363), (395, 28528), (399, 28558), (400, 28573), (417, 28729), (424, 28741), (428, 28765), (436, 28819), (438, 28852), (442, 28897), (453, 28990), (454, 28999), (456, 29011), (458, 29020), (461, 29041), (462, 29044), (469, 29116), (470, 29119), (473, 29140), (478, 29182), (494, 29332), (497, 29365), (498, 29374), (520, 29611), (525, 29656), (537, 29722), (539, 29728), (540, 29749), (541, 29758), (543, 29779), (547, 29800), (551, 29845), (558, 29986), (578, 30175), (579, 30208), (587, 30310), (588, 30322), (592, 30349),

Gene: Buggaboo_40 Start: 24297, Stop: 29702, Start Num: 1

Candidate Starts for Buggaboo_40:

(Start: 1 @24297 has 51 MA's), (10, 24426), (31, 24645), (32, 24654), (63, 24858), (87, 25146), (92, 25209), (93, 25221), (95, 25227), (114, 25521), (117, 25551), (119, 25584), (123, 25680), (125, 25704), (131, 25734), (143, 25824), (148, 25860), (155, 25908), (156, 25914), (158, 25923), (160, 25938), (162, 25959), (163, 25968), (169, 26019), (171, 26049), (200, 26292), (202, 26319), (203, 26328), (207, 26349), (211, 26394), (219, 26454), (221, 26478), (223, 26490), (253, 26667), (263, 26706), (265, 26727), (271, 26760), (278, 26793), (279, 26796), (284, 26817), (285, 26823), (293, 26862), (294, 26868), (298, 26889), (303, 26904), (308, 26925), (316, 26964), (320, 26979), (321, 26988), (323, 26997), (326, 27009), (330, 27039), (331, 27045), (332, 27048), (337, 27099), (341, 27123), (344, 27165), (345, 27177), (360, 27297), (363, 27309), (366, 27369), (371, 27402), (375, 27420), (376, 27426), (379, 27474), (381, 27489), (382, 27498), (383, 27501), (386, 27534), (387, 27543), (388, 27552), (390, 27558), (408, 27714), (419, 27822), (420, 27825), (427, 27873), (430,

27897), (435, 27924), (437, 27957), (441, 27990), (445, 28047), (451, 28089), (455, 28137), (456, 28146), (458, 28155), (465, 28224), (472, 28278), (474, 28296), (476, 28311), (480, 28353), (482, 28362), (485, 28404), (486, 28407), (488, 28437), (489, 28449), (555, 29241), (559, 29274), (561, 29316), (567, 29367), (582, 29556), (587, 29604), (590, 29634), (592, 29643), (594, 29667),

Gene: ChewyVIII_54 Start: 32390, Stop: 37234, Start Num: 1

Candidate Starts for ChewyVIII_54:

(Start: 1 @32390 has 51 MA's), (3, 32405), (8, 32504), (13, 32561), (20, 32603), (25, 32672), (31, 32732), (35, 32753), (36, 32759), (39, 32777), (56, 32894), (60, 32936), (61, 32939), (65, 32975), (72, 33056), (77, 33101), (79, 33113), (80, 33131), (88, 33236), (91, 33278), (92, 33296), (95, 33314), (106, 33494), (116, 33632), (119, 33674), (120, 33707), (126, 33800), (149, 33956), (152, 33986), (153, 33989), (164, 34064), (176, 34166), (179, 34229), (180, 34241), (186, 34274), (188, 34301), (194, 34346), (195, 34352), (200, 34370), (201, 34385), (227, 34580), (253, 34715), (259, 34742), (264, 34754), (266, 34772), (322, 34946), (324, 34958), (343, 35039), (388, 35390), (391, 35411), (396, 35435), (399, 35459), (401, 35486), (407, 35507), (410, 35543), (411, 35555), (414, 35573), (415, 35582), (426, 35630), (434, 35675), (441, 35738), (442, 35756), (446, 35786), (450, 35810), (454, 35852), (468, 35960), (481, 36053), (484, 36077), (501, 36239), (503, 36254), (514, 36413), (522, 36467), (529, 36524), (536, 36554), (546, 36638), (552, 36707), (570, 36932), (571, 36935), (573, 36944), (582, 37085), (586, 37121), (590, 37169), (591, 37175), (592, 37178),

Gene: CoffeeBean_43 Start: 25156, Stop: 30366, Start Num: 1

Candidate Starts for CoffeeBean_43:

(Start: 1 @25156 has 51 MA's), (16, 25348), (31, 25504), (33, 25516), (40, 25558), (41, 25561), (48, 25639), (50, 25654), (63, 25747), (81, 25945), (90, 26065), (92, 26092), (107, 26290), (119, 26467), (121, 26509), (125, 26587), (127, 26593), (135, 26665), (136, 26677), (137, 26683), (142, 26704), (148, 26743), (157, 26800), (162, 26842), (163, 26851), (168, 26884), (169, 26902), (171, 26932), (185, 27058), (188, 27091), (196, 27154), (202, 27202), (203, 27211), (209, 27265), (219, 27337), (220, 27358), (222, 27367), (244, 27523), (252, 27574), (261, 27622), (266, 27655), (272, 27694), (273, 27697), (283, 27748), (284, 27751), (289, 27784), (299, 27826), (303, 27838), (304, 27841), (306, 27850), (314, 27892), (315, 27895), (317, 27901), (320, 27913), (329, 27967), (331, 27979), (350, 28156), (351, 28165), (353, 28168), (361, 28213), (370, 28303), (374, 28321), (395, 28486), (399, 28516), (400, 28531), (417, 28687), (424, 28699), (428, 28723), (436, 28777), (438, 28810), (442, 28855), (453, 28948), (454, 28957), (456, 28969), (458, 28978), (461, 28999), (462, 29002), (469, 29074), (470, 29077), (473, 29098), (478, 29140), (494, 29290), (497, 29323), (498, 29332), (520, 29569), (525, 29614), (537, 29680), (539, 29686), (540, 29707), (541, 29716), (543, 29737), (547, 29758), (551, 29803), (558, 29944), (578, 30133), (579, 30166), (587, 30268), (588, 30280), (592, 30307),

Gene: Colleen_17 Start: 11629, Stop: 16536, Start Num: 6

Candidate Starts for Colleen_17:

(Start: 6 @11629 has 4 MA's), (42, 11956), (57, 12085), (60, 12124), (66, 12172), (80, 12325), (82, 12370), (92, 12538), (96, 12565), (100, 12649), (103, 12688), (114, 12898), (119, 12961), (121, 13003), (128, 13090), (129, 13099), (131, 13111), (138, 13180), (142, 13198), (144, 13207), (145, 13216), (152, 13270), (155, 13285), (167, 13369), (172, 13429), (175, 13447), (180, 13525), (181, 13534), (183, 13543), (184, 13546), (189, 13606), (192, 13618), (193, 13630), (194, 13639), (211, 13771), (239, 13918), (242, 13936), (246, 13966), (251, 14002), (252, 14008), (255, 14038), (263, 14062), (268, 14065), (283, 14140), (285, 14149), (288, 14170), (289, 14173), (291, 14179), (296, 14203), (297, 14206), (305, 14221), (307, 14233), (312, 14254), (313, 14266), (317, 14278), (319, 14287), (339, 14386), (341, 14398), (343, 14419), (348, 14485), (362, 14575), (365, 14596), (377, 14701), (409, 14980), (425, 15115), (429, 15151), (440, 15253), (443, 15283), (448, 15325), (457, 15403), (475, 15565), (487, 15661), (502, 15802), (506, 15844), (508, 15865), (526, 16063), (528, 16087), (535, 16135), (553, 16384), (557, 16417), (561, 16480), (565, 16513), (567, 16522),

Gene: Commandaria_41 Start: 24799, Stop: 30195, Start Num: 1

Candidate Starts for Commandaria_41:

(Start: 1 @24799 has 51 MA's), (28, 25105), (29, 25126), (31, 25147), (63, 25369), (65, 25381), (87, 25657), (92, 25720), (93, 25732), (95, 25738), (113, 26020), (114, 26032), (117, 26062), (119, 26095), (121, 26137), (124, 26203), (131, 26245), (140, 26326), (148, 26371), (160, 26449), (162, 26470), (163, 26479), (169, 26530), (170, 26554), (171, 26560), (200, 26803), (203, 26839), (207, 26860), (210, 26902), (211, 26905), (241, 27085), (250, 27151), (253, 27178), (258, 27205), (263, 27217), (267, 27247), (277, 27298), (282, 27319), (284, 27328), (287, 27352), (292, 27370), (299, 27403), (320, 27490), (327, 27532), (329, 27544), (342, 27646), (346, 27706), (364, 27826), (368, 27901), (371, 27916), (375, 27934), (376, 27940), (379, 27988), (381, 28003), (386, 28048), (387, 28057), (388, 28066), (390, 28072), (408, 28228), (419, 28336), (420, 28339), (427, 28387), (430, 28411), (435, 28438), (437, 28471), (441, 28504), (444, 28558), (445, 28561), (451, 28603), (456, 28660), (458, 28669), (460, 28684), (464, 28726), (465, 28738), (469, 28774), (472, 28792), (483, 28888), (485, 28930), (486, 28933), (488, 28963), (489, 28975), (490, 28984), (511, 29218), (524, 29353), (559, 29767), (568, 29863), (581, 30040), (582, 30049), (585, 30073), (590, 30127), (592, 30136),

Gene: Dalilpop_44 Start: 25804, Stop: 31200, Start Num: 1

Candidate Starts for Dalilpop_44:

(Start: 1 @25804 has 51 MA's), (16, 25996), (43, 26221), (62, 26368), (76, 26503), (92, 26725), (95, 26743), (108, 26926), (114, 27037), (117, 27067), (119, 27100), (131, 27250), (135, 27298), (140, 27331), (148, 27376), (155, 27424), (160, 27454), (163, 27484), (169, 27535), (171, 27565), (192, 27757), (200, 27808), (207, 27865), (210, 27907), (211, 27910), (237, 28060), (239, 28078), (253, 28183), (258, 28210), (264, 28231), (271, 28276), (275, 28291), (277, 28303), (282, 28324), (288, 28363), (298, 28405), (303, 28420), (309, 28444), (310, 28450), (318, 28486), (322, 28507), (329, 28549), (335, 28585), (360, 28816), (363, 28828), (371, 28921), (375, 28939), (376, 28945), (379, 28993), (381, 29008), (386, 29053), (387, 29062), (388, 29071), (390, 29077), (408, 29233), (412, 29269), (419, 29341), (427, 29392), (430, 29416), (435, 29443), (437, 29476), (441, 29509), (445, 29566), (449, 29593), (451, 29608), (456, 29665), (469, 29779), (472, 29797), (474, 29815), (476, 29830), (485, 29920), (486, 29923), (491, 29977), (500, 30076), (559, 30772), (574, 30910), (576, 30961), (582, 31054), (583, 31066), (587, 31102), (589, 31129), (592, 31141),

Gene: Emianna_39 Start: 24486, Stop: 29879, Start Num: 1

Candidate Starts for Emianna_39:

(Start: 1 @24486 has 51 MA's), (29, 24813), (31, 24834), (54, 24978), (58, 25023), (63, 25056), (75, 25176), (95, 25425), (99, 25482), (114, 25719), (117, 25749), (119, 25782), (125, 25902), (131, 25932), (143, 26022), (148, 26058), (155, 26106), (156, 26112), (160, 26136), (162, 26157), (163, 26166), (169, 26217), (171, 26247), (207, 26547), (210, 26589), (211, 26592), (219, 26652), (222, 26682), (248, 26820), (250, 26838), (253, 26865), (257, 26886), (258, 26892), (266, 26931), (267, 26934), (279, 26994), (282, 27006), (284, 27015), (294, 27066), (297, 27081), (327, 27219), (329, 27231), (338, 27306), (346, 27393), (360, 27498), (363, 27510), (371, 27603), (376, 27627), (379, 27675), (381, 27690), (385, 27711), (386, 27735), (387, 27744), (388, 27753), (390, 27759), (394, 27795), (398, 27822), (408, 27915), (419, 28023), (427, 28074), (430, 28098), (435, 28125), (437, 28158), (441, 28191), (445, 28248), (449, 28275), (451, 28290), (456, 28347), (464, 28413), (474, 28497), (485, 28605), (486, 28608), (488, 28638), (554, 29412), (559, 29451), (566, 29538), (578, 29646), (582, 29733), (585, 29757), (587, 29781), (590, 29811), (592, 29820),

Gene: Ennea_45 Start: 25122, Stop: 30548, Start Num: 1

Candidate Starts for Ennea_45:

(Start: 1 @25122 has 51 MA's), (31, 25470), (42, 25530), (43, 25539), (76, 25812), (92, 26034), (93, 26046), (95, 26052), (114, 26346), (117, 26376), (119, 26409), (131, 26559), (143, 26649), (148, 26685), (155, 26733), (156, 26739), (160, 26763), (162, 26784), (163, 26793), (169, 26844), (171, 26874), (200, 27117), (207, 27174), (211, 27219), (212, 27225), (233, 27357), (238, 27384), (253, 27492), (257, 27513), (258, 27519), (267, 27561), (284, 27642), (285, 27648), (294, 27693), (297,

27708), (311, 27762), (329, 27858), (346, 28020), (350, 28059), (354, 28089), (363, 28137), (366, 28197), (371, 28230), (376, 28254), (379, 28302), (381, 28317), (382, 28326), (386, 28362), (387, 28371), (388, 28380), (389, 28383), (390, 28386), (408, 28542), (412, 28578), (419, 28650), (427, 28698), (435, 28749), (437, 28782), (441, 28815), (445, 28872), (447, 28887), (464, 29037), (465, 29049), (476, 29136), (482, 29187), (485, 29229), (486, 29232), (488, 29262), (513, 29556), (521, 29646), (523, 29667), (531, 29736), (542, 29823), (559, 30120), (562, 30168), (566, 30207), (582, 30402), (587, 30450), (588, 30462), (589, 30477), (592, 30489), (593, 30498),

Gene: Flapper_43 Start: 24865, Stop: 30267, Start Num: 1

Candidate Starts for Flapper_43:

(Start: 1 @24865 has 51 MA's), (16, 25057), (37, 25246), (43, 25282), (76, 25561), (92, 25783), (95, 25801), (102, 25915), (114, 26095), (117, 26125), (119, 26158), (131, 26308), (135, 26356), (140, 26389), (148, 26434), (155, 26482), (160, 26512), (163, 26542), (169, 26593), (171, 26623), (192, 26815), (207, 26923), (210, 26965), (211, 26968), (237, 27118), (253, 27241), (258, 27268), (271, 27334), (275, 27349), (277, 27361), (280, 27373), (282, 27382), (288, 27421), (309, 27502), (310, 27508), (313, 27529), (318, 27544), (322, 27565), (329, 27607), (335, 27643), (337, 27673), (360, 27874), (363, 27886), (371, 27979), (376, 28003), (379, 28051), (381, 28066), (386, 28111), (387, 28120), (388, 28129), (390, 28135), (408, 28291), (419, 28399), (420, 28402), (427, 28450), (430, 28474), (434, 28498), (435, 28501), (437, 28534), (441, 28567), (445, 28624), (447, 28639), (451, 28666), (456, 28723), (469, 28837), (472, 28855), (474, 28873), (476, 28888), (485, 28978), (491, 29035), (524, 29413), (559, 29839), (576, 30028), (582, 30121), (587, 30169), (589, 30196), (592, 30208),

Gene: Float294_41 Start: 24561, Stop: 29990, Start Num: 1

Candidate Starts for Float294_41:

(Start: 1 @24561 has 51 MA's), (31, 24909), (42, 24969), (43, 24978), (76, 25254), (80, 25296), (92, 25476), (93, 25488), (95, 25494), (110, 25713), (114, 25788), (117, 25818), (119, 25851), (131, 26001), (143, 26091), (148, 26127), (155, 26175), (156, 26181), (160, 26205), (162, 26226), (163, 26235), (169, 26286), (171, 26316), (200, 26559), (207, 26616), (208, 26628), (211, 26661), (212, 26667), (233, 26799), (238, 26826), (253, 26934), (257, 26955), (267, 27003), (284, 27084), (285, 27090), (294, 27135), (297, 27150), (311, 27204), (329, 27300), (346, 27462), (350, 27501), (354, 27531), (363, 27579), (366, 27639), (371, 27672), (376, 27696), (379, 27744), (381, 27759), (382, 27768), (386, 27804), (387, 27813), (388, 27822), (389, 27825), (390, 27828), (408, 27984), (412, 28020), (419, 28092), (427, 28140), (435, 28191), (437, 28224), (441, 28257), (445, 28314), (447, 28329), (464, 28479), (465, 28491), (476, 28578), (482, 28629), (485, 28671), (486, 28674), (488, 28704), (513, 28998), (521, 29088), (523, 29109), (531, 29178), (542, 29265), (559, 29562), (562, 29610), (566, 29649), (582, 29844), (587, 29892), (588, 29904), (589, 29919), (592, 29931), (593, 29940),

Gene: Foxboro_40 Start: 24992, Stop: 30385, Start Num: 1

Candidate Starts for Foxboro_40:

(Start: 1 @24992 has 51 MA's), (29, 25319), (31, 25340), (54, 25484), (58, 25529), (63, 25562), (75, 25682), (95, 25931), (99, 25988), (114, 26225), (117, 26255), (119, 26288), (125, 26408), (131, 26438), (143, 26528), (148, 26564), (155, 26612), (156, 26618), (160, 26642), (162, 26663), (163, 26672), (169, 26723), (171, 26753), (207, 27053), (210, 27095), (211, 27098), (219, 27158), (222, 27188), (248, 27326), (250, 27344), (253, 27371), (257, 27392), (258, 27398), (266, 27437), (267, 27440), (279, 27500), (282, 27512), (284, 27521), (294, 27572), (297, 27587), (321, 27692), (327, 27725), (329, 27737), (338, 27812), (346, 27899), (360, 28004), (363, 28016), (371, 28109), (376, 28133), (379, 28181), (381, 28196), (385, 28217), (386, 28241), (387, 28250), (388, 28259), (390, 28265), (394, 28301), (398, 28328), (408, 28421), (419, 28529), (427, 28580), (430, 28604), (435, 28631), (437, 28664), (441, 28697), (445, 28754), (449, 28781), (451, 28796), (456, 28853), (464, 28919), (474, 29003), (485, 29111), (486, 29114), (488, 29144), (554, 29918), (559, 29957), (566, 30044), (578, 30152), (582, 30239), (585, 30263), (587, 30287), (590, 30317), (592, 30326),

Gene: Fury_48 Start: 24214, Stop: 29757, Start Num: 1

Candidate Starts for Fury_48:

(Start: 1 @24214 has 51 MA's), (16, 24403), (21, 24472), (22, 24475), (29, 24538), (31, 24559), (63, 24787), (92, 25138), (95, 25156), (100, 25243), (102, 25270), (109, 25357), (111, 25396), (114, 25450), (117, 25480), (119, 25513), (120, 25546), (124, 25621), (148, 25789), (160, 25867), (162, 25888), (163, 25897), (166, 25921), (169, 25948), (171, 25978), (202, 26248), (207, 26278), (211, 26323), (250, 26569), (253, 26596), (254, 26602), (264, 26644), (271, 26689), (280, 26728), (285, 26752), (293, 26791), (294, 26797), (303, 26833), (306, 26845), (307, 26851), (308, 26854), (313, 26884), (316, 26893), (320, 26908), (330, 26968), (333, 26986), (344, 27097), (350, 27163), (363, 27241), (371, 27358), (376, 27382), (379, 27430), (381, 27445), (384, 27463), (386, 27490), (392, 27541), (399, 27595), (407, 27655), (413, 27742), (416, 27763), (433, 27886), (463, 28204), (464, 28228), (465, 28240), (485, 28420), (515, 28801), (518, 28855), (530, 28945), (560, 29341), (566, 29416), (577, 29521), (582, 29611), (588, 29671), (589, 29686), (592, 29698), (593, 29707),

Gene: GAL1_18 Start: 11671, Stop: 16068, Start Num: 4

Candidate Starts for GAL1_18:

(Start: 1 @11638 has 51 MA's), (2, 11647), (3, 11653), (4, 11671), (5, 11719), (7, 11728), (9, 11761), (14, 11818), (15, 11827), (18, 11842), (23, 11905), (24, 11914), (26, 11926), (35, 12004), (38, 12025), (45, 12073), (52, 12124), (55, 12136), (59, 12193), (64, 12235), (67, 12259), (69, 12280), (70, 12283), (71, 12295), (73, 12334), (74, 12343), (83, 12472), (84, 12475), (85, 12481), (86, 12502), (89, 12544), (92, 12586), (93, 12598), (94, 12601), (97, 12640), (101, 12718), (102, 12724), (103, 12736), (104, 12745), (110, 12829), (112, 12871), (115, 12913), (118, 12958), (119, 12979), (120, 13012), (121, 13021), (123, 13075), (130, 13123), (133, 13144), (134, 13147), (139, 13207), (146, 13234), (147, 13237), (150, 13267), (151, 13270), (154, 13288), (159, 13321), (162, 13345), (173, 13444), (177, 13486), (178, 13504), (181, 13549), (182, 13552), (190, 13627), (204, 13723), (207, 13744), (208, 13756), (209, 13777), (214, 13810), (215, 13822), (216, 13828), (224, 13888), (225, 13897), (226, 13900), (228, 13909), (230, 13930), (232, 13933), (234, 13939), (235, 13942), (241, 13981), (242, 13987), (243, 13993), (244, 14008), (248, 14029), (249, 14044), (252, 14059), (255, 14089), (256, 14092), (257, 14095), (260, 14104), (262, 14110), (267, 14143), (270, 14164), (276, 14188), (283, 14221), (288, 14254), (302, 14296), (325, 14392), (340, 14500), (345, 14563), (357, 14653), (373, 14794), (393, 14962), (397, 14992), (403, 15052), (423, 15235), (431, 15283), (442, 15406), (446, 15454), (452, 15508), (467, 15637), (492, 15853), (495, 15883), (499, 15919), (504, 15964), (505, 15967), (507, 16000), (510, 16021), (512, 16054),

Gene: GRU1_29 Start: 16753, Stop: 22167, Start Num: 1

Candidate Starts for GRU1_29:

(Start: 1 @16753 has 51 MA's), (43, 17170), (76, 17461), (92, 17683), (95, 17701), (114, 17995), (117, 18025), (119, 18058), (129, 18196), (131, 18208), (135, 18256), (140, 18289), (148, 18334), (155, 18382), (160, 18412), (163, 18442), (169, 18493), (171, 18523), (192, 18715), (200, 18766), (207, 18823), (210, 18865), (211, 18868), (237, 19018), (253, 19141), (258, 19168), (264, 19189), (271, 19234), (275, 19249), (277, 19261), (282, 19282), (288, 19321), (298, 19363), (303, 19378), (309, 19402), (310, 19408), (318, 19444), (322, 19465), (329, 19507), (335, 19543), (360, 19774), (363, 19786), (371, 19879), (376, 19903), (379, 19951), (381, 19966), (386, 20011), (387, 20020), (388, 20029), (390, 20035), (408, 20191), (412, 20227), (419, 20299), (427, 20350), (430, 20374), (434, 20398), (435, 20401), (437, 20434), (441, 20467), (445, 20524), (447, 20539), (451, 20566), (456, 20623), (469, 20737), (472, 20755), (474, 20773), (476, 20788), (485, 20878), (486, 20881), (491, 20935), (559, 21739), (575, 21910), (576, 21928), (582, 22021), (587, 22069), (589, 22096), (592, 22108),

Gene: GTE5_30 Start: 17717, Stop: 23122, Start Num: 1

Candidate Starts for GTE5_30:

(Start: 1 @17717 has 51 MA's), (16, 17909), (37, 18098), (43, 18134), (76, 18413), (92, 18635), (95, 18653), (114, 18947), (117, 18977), (119, 19010), (131, 19160), (135, 19208), (140, 19241), (148, 19286), (155, 19334), (160, 19364), (163, 19394), (169, 19445), (171, 19475), (192, 19667), (200, 19718), (207, 19775), (210, 19817), (211, 19820), (237, 19970), (253, 20093), (258, 20120), (264, 20141), (271, 20186), (275, 20201), (277, 20213), (280, 20225), (282, 20234), (288, 20273), (309, 20354), (310, 20360), (318, 20396), (322, 20417), (329, 20459), (335, 20495), (360, 20726), (371, 20831), (376, 20855), (379, 20903), (381, 20918), (386, 20963), (387, 20972), (388, 20981), (390, 20987), (394, 21023), (408, 21143), (419, 21251), (420, 21254), (427, 21302), (430, 21326), (434, 21350), (435, 21353), (437, 21386), (441, 21419), (444, 21476), (445, 21479), (451, 21521), (456, 21578), (469, 21692), (472, 21710), (474, 21728), (476, 21743), (485, 21833), (491, 21890), (519, 22229), (524, 22268), (559, 22694), (576, 22883), (582, 22976), (583, 22988), (587, 23024), (589, 23051), (592, 23063),

Gene: GTE8_28 Start: 17751, Stop: 23138, Start Num: 1

Candidate Starts for GTE8_28:

(Start: 1 @17751 has 51 MA's), (29, 18078), (31, 18099), (54, 18243), (63, 18321), (95, 18690), (99, 18747), (114, 18984), (117, 19014), (119, 19047), (125, 19167), (131, 19197), (141, 19278), (148, 19323), (155, 19371), (156, 19377), (160, 19401), (162, 19422), (163, 19431), (169, 19482), (171, 19512), (200, 19755), (207, 19812), (210, 19854), (211, 19857), (219, 19917), (253, 20130), (257, 20151), (258, 20157), (267, 20199), (284, 20280), (285, 20286), (294, 20331), (297, 20346), (300, 20358), (338, 20571), (346, 20658), (360, 20763), (363, 20775), (371, 20868), (375, 20886), (376, 20892), (379, 20940), (381, 20955), (386, 21000), (387, 21009), (388, 21018), (390, 21024), (398, 21087), (408, 21180), (418, 21285), (419, 21288), (421, 21300), (427, 21333), (430, 21357), (434, 21381), (435, 21384), (437, 21417), (441, 21450), (445, 21507), (451, 21549), (464, 21672), (465, 21684), (474, 21756), (477, 21780), (485, 21864), (486, 21867), (488, 21897), (554, 22671), (559, 22710), (566, 22797), (572, 22836), (582, 22992), (585, 23016), (587, 23040), (590, 23070), (592, 23079),

Gene: Gagieri_43 Start: 25032, Stop: 30248, Start Num: 1

Candidate Starts for Gagieri_43:

(Start: 1 @25032 has 51 MA's), (16, 25224), (29, 25359), (31, 25380), (35, 25401), (44, 25452), (46, 25482), (48, 25515), (50, 25530), (58, 25602), (63, 25635), (75, 25755), (81, 25833), (85, 25875), (92, 25980), (107, 26178), (119, 26355), (121, 26397), (125, 26475), (135, 26553), (137, 26571), (142, 26592), (148, 26631), (157, 26688), (162, 26730), (163, 26739), (168, 26772), (169, 26790), (171, 26820), (184, 26940), (187, 26961), (188, 26979), (192, 27012), (196, 27042), (202, 27090), (206, 27114), (211, 27165), (219, 27225), (220, 27246), (222, 27255), (231, 27318), (236, 27345), (237, 27351), (243, 27396), (244, 27411), (247, 27429), (252, 27462), (261, 27510), (272, 27582), (273, 27585), (279, 27615), (283, 27636), (284, 27639), (289, 27672), (295, 27699), (299, 27714), (303, 27726), (304, 27729), (306, 27738), (314, 27780), (315, 27783), (317, 27789), (320, 27801), (328, 27846), (329, 27855), (331, 27867), (347, 28020), (350, 28044), (351, 28053), (353, 28056), (356, 28068), (370, 28191), (374, 28209), (399, 28404), (400, 28419), (402, 28434), (405, 28452), (417, 28569), (436, 28659), (438, 28692), (442, 28737), (453, 28830), (454, 28839), (456, 28851), (458, 28860), (469, 28956), (473, 28980), (478, 29022), (497, 29202), (498, 29211), (520, 29448), (525, 29493), (537, 29559), (539, 29565), (540, 29586), (541, 29595), (543, 29616), (544, 29619), (547, 29637), (551, 29682), (552, 29715), (558, 29823), (578, 30012), (579, 30045), (580, 30078), (582, 30099), (587, 30147), (588, 30159), (592, 30186),

Gene: GrootJr_41 Start: 23862, Stop: 29261, Start Num: 1

Candidate Starts for GrootJr_41:

(Start: 1 @23862 has 51 MA's), (16, 24054), (29, 24189), (31, 24210), (34, 24225), (54, 24354), (58, 24405), (63, 24438), (95, 24807), (99, 24864), (114, 25101), (117, 25131), (119, 25164), (125, 25284), (131, 25314), (143, 25404), (148, 25440), (155, 25488), (156, 25494), (160, 25518), (162, 25539), (163, 25548), (169, 25599), (171, 25629), (207, 25929), (210, 25971), (211, 25974), (219, 26034),

(222, 26064), (248, 26202), (250, 26220), (253, 26247), (257, 26268), (258, 26274), (266, 26313), (267, 26316), (279, 26376), (282, 26388), (284, 26397), (294, 26448), (297, 26463), (327, 26601), (329, 26613), (338, 26688), (346, 26775), (360, 26880), (363, 26892), (371, 26985), (376, 27009), (379, 27057), (381, 27072), (385, 27093), (386, 27117), (387, 27126), (388, 27135), (390, 27141), (394, 27177), (398, 27204), (408, 27297), (419, 27405), (427, 27456), (430, 27480), (435, 27507), (437, 27540), (441, 27573), (445, 27630), (449, 27657), (451, 27672), (456, 27729), (464, 27795), (474, 27879), (485, 27987), (486, 27990), (488, 28020), (554, 28794), (559, 28833), (566, 28920), (578, 29028), (582, 29115), (585, 29139), (587, 29163), (590, 29193), (592, 29202),

Gene: HomeFry_45 Start: 22840, Stop: 28359, Start Num: 1

Candidate Starts for HomeFry_45:

(Start: 1 @22840 has 51 MA's), (16, 23029), (21, 23098), (29, 23164), (31, 23185), (58, 23377), (63, 23410), (68, 23458), (92, 23761), (95, 23779), (100, 23866), (102, 23893), (111, 24019), (114, 24073), (117, 24103), (119, 24136), (120, 24169), (130, 24280), (136, 24346), (148, 24412), (160, 24490), (169, 24571), (171, 24601), (202, 24871), (207, 24901), (211, 24946), (229, 25072), (250, 25192), (253, 25219), (254, 25225), (264, 25267), (271, 25312), (280, 25351), (285, 25375), (293, 25414), (294, 25420), (303, 25456), (306, 25468), (307, 25474), (308, 25477), (316, 25516), (320, 25531), (330, 25591), (333, 25609), (344, 25720), (345, 25732), (350, 25786), (363, 25864), (371, 25981), (376, 26005), (379, 26053), (381, 26068), (386, 26113), (392, 26164), (399, 26218), (407, 26278), (413, 26365), (433, 26509), (464, 26845), (465, 26857), (485, 27037), (505, 27277), (515, 27421), (517, 27454), (560, 27943), (566, 28018), (582, 28213), (588, 28273), (589, 28288), (592, 28300), (593, 28309),

Gene: HubbaBubba_37 Start: 20251, Stop: 25650, Start Num: 1

Candidate Starts for HubbaBubba_37:

(Start: 1 @20251 has 51 MA's), (8, 20362), (10, 20380), (11, 20410), (17, 20449), (30, 20584), (31, 20599), (51, 20737), (62, 20824), (63, 20830), (87, 21118), (92, 21181), (93, 21193), (95, 21199), (113, 21481), (119, 21556), (124, 21664), (131, 21706), (140, 21787), (148, 21832), (155, 21880), (160, 21910), (163, 21940), (169, 21991), (171, 22021), (189, 22201), (192, 22213), (207, 22321), (211, 22366), (212, 22372), (240, 22537), (243, 22558), (250, 22612), (253, 22639), (257, 22660), (263, 22678), (266, 22705), (284, 22789), (289, 22822), (293, 22834), (300, 22867), (302, 22873), (307, 22894), (311, 22909), (313, 22927), (321, 22960), (334, 23038), (344, 23140), (350, 23206), (371, 23377), (379, 23449), (381, 23464), (386, 23509), (387, 23518), (388, 23527), (404, 23650), (408, 23689), (418, 23794), (419, 23797), (422, 23809), (434, 23890), (435, 23893), (437, 23926), (441, 23959), (444, 24016), (445, 24019), (456, 24118), (459, 24130), (464, 24184), (466, 24199), (472, 24250), (474, 24268), (477, 24292), (480, 24328), (485, 24388), (486, 24391), (488, 24421), (490, 24442), (516, 24763), (559, 25222), (561, 25264), (582, 25504), (588, 25564), (590, 25582), (592, 25591),

Gene: IDyn_40 Start: 21647, Stop: 27046, Start Num: 1

Candidate Starts for IDyn_40:

(Start: 1 @21647 has 51 MA's), (8, 21758), (10, 21776), (11, 21806), (17, 21845), (30, 21980), (31, 21995), (51, 22133), (58, 22193), (62, 22220), (63, 22226), (87, 22514), (92, 22577), (93, 22589), (95, 22595), (113, 22877), (119, 22952), (124, 23060), (131, 23102), (135, 23150), (140, 23183), (148, 23228), (155, 23276), (160, 23306), (163, 23336), (169, 23387), (171, 23417), (189, 23597), (207, 23717), (211, 23762), (212, 23768), (223, 23858), (240, 23933), (250, 24008), (253, 24035), (257, 24056), (263, 24074), (266, 24101), (289, 24218), (293, 24230), (300, 24263), (302, 24269), (307, 24290), (311, 24305), (313, 24323), (320, 24347), (321, 24356), (334, 24434), (344, 24536), (350, 24602), (371, 24773), (379, 24845), (381, 24860), (386, 24905), (387, 24914), (388, 24923), (404, 25046), (408, 25085), (418, 25190), (419, 25193), (422, 25205), (434, 25286), (435, 25289), (437, 25322), (441, 25355), (444, 25412), (445, 25415), (456, 25514), (459, 25526), (464, 25580), (466, 25595), (472, 25646), (474, 25664), (477, 25688), (480, 25724), (485, 25784), (486, 25787), (488, 25817), (490, 25838), (509, 26048), (516, 26159), (559, 26618), (561, 26660), (582, 26900), (588,

26960), (590, 26978), (592, 26987),

Gene: Jifall16_38 Start: 24140, Stop: 29533, Start Num: 1

Candidate Starts for Jifall16_38:

(Start: 1 @24140 has 51 MA's), (29, 24467), (31, 24488), (54, 24632), (58, 24677), (63, 24710), (75, 24830), (95, 25079), (99, 25136), (114, 25373), (117, 25403), (119, 25436), (125, 25556), (131, 25586), (143, 25676), (148, 25712), (155, 25760), (156, 25766), (160, 25790), (162, 25811), (163, 25820), (169, 25871), (171, 25901), (207, 26201), (210, 26243), (211, 26246), (219, 26306), (222, 26336), (248, 26474), (250, 26492), (253, 26519), (257, 26540), (258, 26546), (266, 26585), (267, 26588), (279, 26648), (282, 26660), (284, 26669), (294, 26720), (297, 26735), (327, 26873), (329, 26885), (338, 26960), (346, 27047), (360, 27152), (363, 27164), (371, 27257), (376, 27281), (379, 27329), (381, 27344), (385, 27365), (386, 27389), (387, 27398), (388, 27407), (390, 27413), (394, 27449), (398, 27476), (408, 27569), (419, 27677), (427, 27728), (430, 27752), (435, 27779), (437, 27812), (441, 27845), (445, 27902), (449, 27929), (451, 27944), (456, 28001), (464, 28067), (474, 28151), (485, 28259), (486, 28262), (488, 28292), (554, 29066), (559, 29105), (566, 29192), (578, 29300), (582, 29387), (584, 29402), (585, 29411), (587, 29435), (590, 29465), (592, 29474),

Gene: Kabluna_42 Start: 23212, Stop: 28638, Start Num: 1

Candidate Starts for Kabluna_42:

(Start: 1 @23212 has 51 MA's), (10, 23341), (12, 23374), (27, 23503), (31, 23560), (32, 23569), (54, 23704), (63, 23785), (87, 24073), (92, 24136), (93, 24148), (95, 24154), (114, 24448), (117, 24478), (119, 24511), (125, 24631), (131, 24661), (132, 24664), (143, 24751), (148, 24787), (155, 24835), (160, 24865), (162, 24886), (163, 24895), (169, 24946), (171, 24976), (200, 25219), (202, 25246), (203, 25255), (207, 25276), (211, 25321), (218, 25372), (219, 25381), (221, 25405), (253, 25594), (263, 25633), (265, 25654), (269, 25678), (279, 25723), (284, 25744), (285, 25750), (293, 25789), (294, 25795), (298, 25816), (308, 25852), (316, 25891), (320, 25906), (321, 25915), (323, 25924), (326, 25936), (330, 25966), (331, 25972), (332, 25975), (337, 26026), (341, 26050), (344, 26092), (345, 26104), (360, 26224), (363, 26236), (366, 26296), (371, 26329), (375, 26347), (376, 26353), (379, 26401), (381, 26416), (382, 26425), (383, 26428), (386, 26461), (387, 26470), (388, 26479), (389, 26482), (390, 26485), (408, 26641), (419, 26749), (420, 26752), (427, 26800), (430, 26824), (435, 26851), (437, 26884), (441, 26917), (445, 26974), (451, 27016), (456, 27073), (465, 27151), (474, 27223), (477, 27247), (482, 27289), (485, 27331), (486, 27334), (488, 27364), (489, 27376), (496, 27436), (524, 27790), (550, 28024), (555, 28177), (559, 28210), (561, 28252), (567, 28303), (582, 28492), (587, 28540), (590, 28570), (592, 28579), (594, 28603),

Gene: KidneyBean_39 Start: 24261, Stop: 29657, Start Num: 1

Candidate Starts for KidneyBean_39:

(Start: 1 @24261 has 51 MA's), (16, 24453), (29, 24588), (31, 24609), (34, 24624), (54, 24753), (63, 24834), (95, 25203), (110, 25422), (114, 25497), (117, 25527), (119, 25560), (129, 25698), (131, 25710), (140, 25791), (148, 25836), (155, 25884), (160, 25914), (163, 25944), (165, 25962), (169, 25995), (171, 26025), (200, 26268), (202, 26295), (207, 26325), (210, 26367), (211, 26370), (213, 26385), (222, 26460), (225, 26478), (245, 26583), (250, 26616), (252, 26628), (253, 26643), (254, 26649), (258, 26670), (264, 26691), (271, 26736), (275, 26751), (277, 26763), (278, 26769), (281, 26781), (282, 26784), (286, 26805), (288, 26823), (301, 26874), (318, 26946), (321, 26964), (322, 26967), (330, 27015), (331, 27021), (350, 27210), (358, 27261), (360, 27276), (363, 27288), (371, 27381), (376, 27405), (379, 27453), (381, 27468), (386, 27513), (387, 27522), (388, 27531), (390, 27537), (398, 27600), (408, 27693), (419, 27801), (420, 27804), (427, 27852), (430, 27876), (435, 27903), (437, 27936), (441, 27969), (445, 28026), (451, 28068), (456, 28125), (464, 28191), (474, 28275), (476, 28290), (479, 28320), (485, 28383), (486, 28386), (488, 28416), (559, 29229), (566, 29316), (578, 29424), (582, 29511), (585, 29535), (587, 29559), (590, 29589), (592, 29598),

Gene: Kurt_39 Start: 24501, Stop: 29894, Start Num: 1

Candidate Starts for Kurt_39:

(Start: 1 @24501 has 51 MA's), (29, 24828), (31, 24849), (54, 24993), (58, 25038), (63, 25071), (75, 25191), (95, 25440), (99, 25497), (114, 25734), (117, 25764), (119, 25797), (125, 25917), (131, 25947), (143, 26037), (148, 26073), (155, 26121), (156, 26127), (160, 26151), (162, 26172), (163, 26181), (169, 26232), (171, 26262), (207, 26562), (210, 26604), (211, 26607), (219, 26667), (222, 26697), (248, 26835), (250, 26853), (253, 26880), (257, 26901), (258, 26907), (266, 26946), (267, 26949), (279, 27009), (282, 27021), (284, 27030), (294, 27081), (297, 27096), (327, 27234), (329, 27246), (338, 27321), (346, 27408), (360, 27513), (363, 27525), (371, 27618), (376, 27642), (379, 27690), (381, 27705), (385, 27726), (386, 27750), (387, 27759), (388, 27768), (390, 27774), (394, 27810), (398, 27837), (408, 27930), (419, 28038), (427, 28089), (430, 28113), (435, 28140), (437, 28173), (441, 28206), (445, 28263), (449, 28290), (451, 28305), (456, 28362), (464, 28428), (474, 28512), (485, 28620), (486, 28623), (488, 28653), (554, 29427), (559, 29466), (566, 29553), (578, 29661), (582, 29748), (585, 29772), (587, 29796), (590, 29826), (592, 29835),

Gene: Lollipop1437_44 Start: 25110, Stop: 30536, Start Num: 1

Candidate Starts for Lollipop1437_44:

(Start: 1 @25110 has 51 MA's), (31, 25458), (42, 25518), (43, 25527), (76, 25800), (92, 26022), (93, 26034), (95, 26040), (114, 26334), (117, 26364), (119, 26397), (131, 26547), (143, 26637), (148, 26673), (155, 26721), (156, 26727), (160, 26751), (162, 26772), (163, 26781), (169, 26832), (171, 26862), (200, 27105), (207, 27162), (208, 27174), (211, 27207), (212, 27213), (233, 27345), (238, 27372), (253, 27480), (257, 27501), (258, 27507), (267, 27549), (284, 27630), (285, 27636), (294, 27681), (297, 27696), (311, 27750), (329, 27846), (346, 28008), (350, 28047), (354, 28077), (363, 28125), (366, 28185), (371, 28218), (376, 28242), (379, 28290), (381, 28305), (386, 28350), (387, 28359), (388, 28368), (389, 28371), (390, 28374), (408, 28530), (412, 28566), (419, 28638), (427, 28686), (435, 28737), (437, 28770), (441, 28803), (445, 28860), (447, 28875), (464, 29025), (465, 29037), (476, 29124), (482, 29175), (485, 29217), (486, 29220), (488, 29250), (513, 29544), (521, 29634), (523, 29655), (531, 29724), (542, 29811), (559, 30108), (562, 30156), (566, 30195), (582, 30390), (587, 30438), (588, 30450), (589, 30465), (592, 30477), (593, 30486),

Gene: MacGully_48 Start: 25696, Stop: 30690, Start Num: 1

Candidate Starts for MacGully_48:

(Start: 1 @25696 has 51 MA's), (15, 25882), (16, 25888), (20, 25906), (29, 26023), (31, 26044), (40, 26098), (46, 26146), (48, 26179), (49, 26185), (53, 26194), (63, 26257), (65, 26269), (75, 26377), (78, 26407), (92, 26602), (98, 26668), (107, 26800), (112, 26881), (119, 26977), (120, 27010), (121, 27019), (122, 27061), (135, 27175), (137, 27193), (142, 27214), (160, 27331), (168, 27394), (169, 27412), (171, 27442), (188, 27601), (192, 27634), (207, 27742), (211, 27787), (226, 27898), (250, 28033), (253, 28060), (257, 28081), (263, 28099), (267, 28129), (274, 28162), (283, 28198), (284, 28201), (287, 28222), (290, 28234), (306, 28285), (318, 28330), (322, 28348), (329, 28381), (336, 28426), (352, 28573), (355, 28585), (369, 28678), (372, 28696), (380, 28762), (399, 28909), (400, 28924), (402, 28939), (405, 28957), (417, 29071), (424, 29083), (432, 29137), (436, 29161), (438, 29194), (439, 29203), (456, 29329), (458, 29338), (462, 29362), (469, 29440), (478, 29506), (493, 29638), (527, 29950), (532, 29980), (538, 30001), (547, 30082), (548, 30088), (549, 30097), (551, 30127), (552, 30160), (556, 30253), (558, 30265), (563, 30325), (569, 30373), (588, 30601), (590, 30619), (592, 30628),

Gene: Marietta_41 Start: 21563, Stop: 26962, Start Num: 1

Candidate Starts for Marietta_41:

(Start: 1 @21563 has 51 MA's), (8, 21674), (10, 21692), (11, 21722), (17, 21761), (30, 21896), (31, 21911), (51, 22049), (62, 22136), (63, 22142), (87, 22430), (92, 22493), (93, 22505), (95, 22511), (113, 22793), (119, 22868), (124, 22976), (131, 23018), (140, 23099), (148, 23144), (155, 23192), (160, 23222), (163, 23252), (169, 23303), (171, 23333), (189, 23513), (191, 23519), (192, 23525), (207, 23633), (211, 23678), (212, 23684), (240, 23849), (243, 23870), (250, 23924), (253, 23951), (257, 23972), (263, 23990), (266, 24017), (289, 24134), (293, 24146), (300, 24179), (302, 24185), (307, 24206), (311, 24221), (313, 24239), (320, 24263), (321, 24272), (334, 24350), (344, 24452), (350,

24518), (371, 24689), (379, 24761), (381, 24776), (386, 24821), (387, 24830), (388, 24839), (404, 24962), (408, 25001), (418, 25106), (419, 25109), (422, 25121), (434, 25202), (435, 25205), (437, 25238), (441, 25271), (444, 25328), (445, 25331), (451, 25373), (456, 25430), (459, 25442), (464, 25496), (466, 25511), (472, 25562), (474, 25580), (477, 25604), (480, 25640), (485, 25700), (486, 25703), (488, 25733), (490, 25754), (509, 25964), (516, 26075), (559, 26534), (561, 26576), (582, 26816), (588, 26876), (590, 26894), (592, 26903),

Gene: Maselop_43 Start: 25232, Stop: 30442, Start Num: 1

Candidate Starts for Maselop_43:

(Start: 1 @25232 has 51 MA's), (16, 25424), (31, 25580), (33, 25592), (40, 25634), (41, 25637), (48, 25715), (50, 25730), (63, 25823), (81, 26021), (90, 26141), (92, 26168), (107, 26366), (119, 26543), (121, 26585), (125, 26663), (127, 26669), (135, 26741), (136, 26753), (137, 26759), (142, 26780), (148, 26819), (157, 26876), (162, 26918), (163, 26927), (168, 26960), (169, 26978), (171, 27008), (185, 27134), (188, 27167), (196, 27230), (202, 27278), (203, 27287), (209, 27341), (219, 27413), (220, 27434), (222, 27443), (244, 27599), (252, 27650), (261, 27698), (266, 27731), (272, 27770), (273, 27773), (283, 27824), (284, 27827), (289, 27860), (299, 27902), (303, 27914), (304, 27917), (306, 27926), (314, 27968), (315, 27971), (317, 27977), (320, 27989), (329, 28043), (331, 28055), (350, 28232), (351, 28241), (353, 28244), (361, 28289), (370, 28379), (374, 28397), (395, 28562), (399, 28592), (400, 28607), (417, 28763), (424, 28775), (428, 28799), (436, 28853), (438, 28886), (442, 28931), (453, 29024), (454, 29033), (456, 29045), (458, 29054), (461, 29075), (462, 29078), (469, 29150), (470, 29153), (473, 29174), (478, 29216), (494, 29366), (497, 29399), (498, 29408), (520, 29645), (525, 29690), (537, 29756), (539, 29762), (540, 29783), (541, 29792), (543, 29813), (547, 29834), (551, 29879), (558, 30020), (578, 30209), (579, 30242), (587, 30344), (588, 30356), (592, 30383),

Gene: MerCougar_40 Start: 24411, Stop: 29816, Start Num: 1

Candidate Starts for MerCougar_40:

(Start: 1 @24411 has 51 MA's), (10, 24540), (58, 24939), (63, 24972), (87, 25260), (92, 25323), (93, 25335), (95, 25341), (114, 25635), (117, 25665), (119, 25698), (125, 25818), (148, 25974), (155, 26022), (160, 26052), (163, 26082), (169, 26133), (171, 26163), (189, 26343), (200, 26406), (202, 26433), (205, 26454), (207, 26463), (211, 26508), (219, 26568), (222, 26598), (223, 26604), (253, 26781), (256, 26799), (258, 26808), (264, 26829), (268, 26853), (275, 26889), (277, 26901), (281, 26919), (282, 26922), (301, 27012), (313, 27069), (321, 27102), (322, 27105), (330, 27153), (331, 27159), (363, 27426), (366, 27486), (371, 27519), (375, 27537), (376, 27543), (379, 27591), (381, 27606), (382, 27615), (383, 27618), (386, 27651), (387, 27660), (388, 27669), (389, 27672), (390, 27675), (398, 27738), (408, 27831), (419, 27939), (420, 27942), (427, 27990), (430, 28014), (435, 28041), (437, 28074), (441, 28107), (445, 28164), (451, 28206), (456, 28263), (464, 28329), (465, 28341), (474, 28413), (485, 28518), (554, 29346), (559, 29388), (561, 29430), (567, 29481), (578, 29583), (587, 29718), (590, 29748), (592, 29757),

Gene: NadineRae_39 Start: 20810, Stop: 26215, Start Num: 1

Candidate Starts for NadineRae_39:

(Start: 1 @20810 has 51 MA's), (8, 20921), (10, 20939), (11, 20969), (17, 21008), (30, 21143), (31, 21158), (51, 21296), (58, 21356), (62, 21383), (63, 21389), (87, 21677), (92, 21740), (93, 21752), (95, 21758), (113, 22040), (119, 22115), (124, 22223), (131, 22265), (140, 22346), (148, 22391), (155, 22439), (160, 22469), (163, 22499), (169, 22550), (171, 22580), (174, 22592), (189, 22760), (207, 22880), (211, 22925), (212, 22931), (240, 23096), (250, 23171), (253, 23198), (257, 23219), (263, 23237), (266, 23264), (289, 23381), (293, 23393), (300, 23426), (302, 23432), (307, 23453), (311, 23468), (313, 23486), (320, 23510), (321, 23519), (334, 23597), (344, 23699), (350, 23765), (371, 23936), (375, 23954), (379, 24008), (381, 24023), (386, 24068), (387, 24077), (388, 24086), (408, 24248), (412, 24284), (419, 24356), (420, 24359), (427, 24407), (430, 24431), (434, 24455), (435, 24458), (437, 24491), (441, 24524), (444, 24581), (445, 24584), (451, 24626), (456, 24683), (459, 24695), (464, 24749), (466, 24764), (472, 24815), (474, 24833), (477, 24857), (480, 24893), (485,

24953), (486, 24956), (488, 24986), (490, 25007), (509, 25217), (516, 25328), (559, 25787), (561, 25829), (582, 26069), (588, 26129), (590, 26147), (592, 26156),

Gene: NatB6_39 Start: 23537, Stop: 28930, Start Num: 1

Candidate Starts for NatB6_39:

(Start: 1 @23537 has 51 MA's), (29, 23864), (31, 23885), (54, 24029), (58, 24074), (63, 24107), (75, 24227), (95, 24476), (99, 24533), (114, 24770), (117, 24800), (119, 24833), (125, 24953), (131, 24983), (143, 25073), (148, 25109), (155, 25157), (156, 25163), (160, 25187), (162, 25208), (163, 25217), (169, 25268), (171, 25298), (207, 25598), (210, 25640), (211, 25643), (219, 25703), (222, 25733), (248, 25871), (250, 25889), (253, 25916), (257, 25937), (258, 25943), (266, 25982), (267, 25985), (279, 26045), (282, 26057), (284, 26066), (294, 26117), (297, 26132), (327, 26270), (329, 26282), (338, 26357), (346, 26444), (360, 26549), (363, 26561), (371, 26654), (376, 26678), (379, 26726), (381, 26741), (385, 26762), (386, 26786), (387, 26795), (388, 26804), (390, 26810), (394, 26846), (398, 26873), (408, 26966), (419, 27074), (427, 27125), (430, 27149), (435, 27176), (437, 27209), (441, 27242), (445, 27299), (449, 27326), (451, 27341), (456, 27398), (464, 27464), (474, 27548), (485, 27656), (486, 27659), (488, 27689), (554, 28463), (559, 28502), (566, 28589), (578, 28697), (582, 28784), (585, 28808), (587, 28832), (590, 28862), (592, 28871),

Gene: NosilaM_42 Start: 24109, Stop: 29535, Start Num: 1

Candidate Starts for NosilaM_42:

(Start: 1 @24109 has 51 MA's), (10, 24238), (12, 24271), (27, 24400), (31, 24457), (32, 24466), (54, 24601), (63, 24682), (87, 24970), (92, 25033), (93, 25045), (95, 25051), (114, 25345), (117, 25375), (119, 25408), (125, 25528), (131, 25558), (132, 25561), (143, 25648), (148, 25684), (155, 25732), (160, 25762), (162, 25783), (163, 25792), (169, 25843), (171, 25873), (197, 26107), (200, 26116), (202, 26143), (203, 26152), (207, 26173), (211, 26218), (219, 26278), (221, 26302), (223, 26314), (253, 26491), (263, 26530), (265, 26551), (269, 26575), (279, 26620), (284, 26641), (285, 26647), (293, 26686), (294, 26692), (298, 26713), (303, 26728), (308, 26749), (316, 26788), (320, 26803), (321, 26812), (323, 26821), (326, 26833), (330, 26863), (331, 26869), (332, 26872), (337, 26923), (341, 26947), (344, 26989), (345, 27001), (360, 27121), (363, 27133), (366, 27193), (371, 27226), (375, 27244), (376, 27250), (379, 27298), (381, 27313), (382, 27322), (383, 27325), (386, 27358), (387, 27367), (388, 27376), (389, 27379), (390, 27382), (408, 27538), (419, 27646), (420, 27649), (427, 27697), (430, 27721), (435, 27748), (437, 27781), (441, 27814), (445, 27871), (456, 27970), (465, 28048), (474, 28120), (477, 28144), (480, 28177), (482, 28186), (486, 28231), (488, 28261), (489, 28273), (524, 28687), (550, 28921), (555, 29074), (559, 29107), (561, 29149), (567, 29200), (582, 29389), (587, 29437), (590, 29467), (592, 29476), (594, 29500),

Gene: NovumRegina_39 Start: 23861, Stop: 29260, Start Num: 1

Candidate Starts for NovumRegina_39:

(Start: 1 @23861 has 51 MA's), (16, 24053), (29, 24188), (31, 24209), (34, 24224), (54, 24353), (58, 24404), (63, 24437), (95, 24806), (99, 24863), (114, 25100), (117, 25130), (119, 25163), (125, 25283), (131, 25313), (143, 25403), (148, 25439), (155, 25487), (156, 25493), (160, 25517), (162, 25538), (163, 25547), (169, 25598), (171, 25628), (207, 25928), (210, 25970), (211, 25973), (219, 26033), (222, 26063), (248, 26201), (250, 26219), (253, 26246), (257, 26267), (258, 26273), (266, 26312), (267, 26315), (279, 26375), (282, 26387), (284, 26396), (294, 26447), (297, 26462), (327, 26600), (329, 26612), (338, 26687), (346, 26774), (360, 26879), (363, 26891), (371, 26984), (376, 27008), (379, 27056), (381, 27071), (385, 27092), (386, 27116), (387, 27125), (388, 27134), (390, 27140), (394, 27176), (398, 27203), (408, 27296), (419, 27404), (427, 27455), (430, 27479), (435, 27506), (437, 27539), (441, 27572), (445, 27629), (449, 27656), (451, 27671), (456, 27728), (464, 27794), (474, 27878), (485, 27986), (486, 27989), (488, 28019), (554, 28793), (559, 28832), (566, 28919), (578, 29027), (582, 29114), (585, 29138), (587, 29162), (590, 29192), (592, 29201),

Gene: Outis_40 Start: 24099, Stop: 29510, Start Num: 1

Candidate Starts for Outis_40:

(Start: 1 @24099 has 51 MA's), (8, 24210), (10, 24228), (21, 24360), (31, 24447), (32, 24456), (58, 24633), (63, 24666), (67, 24702), (87, 24954), (92, 25017), (93, 25029), (95, 25035), (114, 25329), (117, 25359), (119, 25392), (125, 25512), (143, 25632), (148, 25668), (155, 25716), (160, 25746), (163, 25776), (169, 25827), (171, 25857), (189, 26037), (200, 26100), (202, 26127), (207, 26157), (211, 26202), (217, 26244), (219, 26262), (222, 26292), (223, 26298), (253, 26475), (258, 26502), (264, 26523), (269, 26559), (275, 26583), (277, 26595), (281, 26613), (282, 26616), (301, 26706), (313, 26763), (321, 26796), (322, 26799), (330, 26847), (331, 26853), (335, 26877), (360, 27108), (363, 27120), (366, 27180), (371, 27213), (375, 27231), (376, 27237), (378, 27279), (379, 27285), (381, 27300), (382, 27309), (383, 27312), (386, 27345), (387, 27354), (388, 27363), (389, 27366), (390, 27369), (408, 27525), (419, 27633), (420, 27636), (427, 27684), (430, 27708), (435, 27735), (437, 27768), (441, 27801), (445, 27858), (451, 27900), (456, 27957), (465, 28035), (474, 28107), (485, 28212), (554, 29040), (559, 29082), (561, 29124), (567, 29175), (578, 29277), (587, 29412), (590, 29442), (592, 29451),

Gene: Patio_42 Start: 24346, Stop: 29772, Start Num: 1

Candidate Starts for Patio_42:

(Start: 1 @24346 has 51 MA's), (31, 24694), (42, 24754), (43, 24763), (76, 25036), (92, 25258), (93, 25270), (95, 25276), (110, 25495), (114, 25570), (117, 25600), (119, 25633), (131, 25783), (143, 25873), (148, 25909), (155, 25957), (156, 25963), (160, 25987), (162, 26008), (163, 26017), (169, 26068), (171, 26098), (200, 26341), (207, 26398), (211, 26443), (212, 26449), (233, 26581), (238, 26608), (253, 26716), (257, 26737), (258, 26743), (267, 26785), (284, 26866), (285, 26872), (294, 26917), (297, 26932), (311, 26986), (329, 27082), (346, 27244), (350, 27283), (354, 27313), (363, 27361), (366, 27421), (371, 27454), (376, 27478), (379, 27526), (381, 27541), (386, 27586), (387, 27595), (388, 27604), (389, 27607), (390, 27610), (408, 27766), (412, 27802), (419, 27874), (427, 27922), (435, 27973), (437, 28006), (441, 28039), (445, 28096), (447, 28111), (464, 28261), (465, 28273), (476, 28360), (482, 28411), (485, 28453), (486, 28456), (488, 28486), (513, 28780), (521, 28870), (523, 28891), (531, 28960), (542, 29047), (559, 29344), (562, 29392), (566, 29431), (582, 29626), (587, 29674), (588, 29686), (589, 29701), (592, 29713), (593, 29722),

Gene: Pemberton_42 Start: 21550, Stop: 26955, Start Num: 1

Candidate Starts for Pemberton_42:

(Start: 1 @21550 has 51 MA's), (8, 21661), (10, 21679), (11, 21709), (17, 21748), (30, 21883), (31, 21898), (51, 22036), (58, 22096), (62, 22123), (63, 22129), (85, 22375), (87, 22417), (92, 22480), (93, 22492), (95, 22498), (113, 22780), (119, 22855), (124, 22963), (131, 23005), (140, 23086), (148, 23131), (155, 23179), (160, 23209), (163, 23239), (169, 23290), (171, 23320), (189, 23500), (191, 23506), (192, 23512), (207, 23620), (211, 23665), (212, 23671), (223, 23761), (240, 23836), (250, 23911), (253, 23938), (257, 23959), (263, 23977), (266, 24004), (284, 24088), (287, 24112), (289, 24121), (293, 24133), (300, 24166), (302, 24172), (307, 24193), (311, 24208), (313, 24226), (316, 24235), (320, 24250), (321, 24259), (334, 24337), (337, 24370), (344, 24439), (350, 24505), (371, 24676), (379, 24748), (381, 24763), (386, 24808), (387, 24817), (388, 24826), (404, 24949), (408, 24988), (412, 25024), (419, 25096), (420, 25099), (427, 25147), (430, 25171), (434, 25195), (435, 25198), (437, 25231), (441, 25264), (444, 25321), (445, 25324), (451, 25366), (456, 25423), (459, 25435), (464, 25489), (466, 25504), (472, 25555), (474, 25573), (477, 25597), (480, 25633), (485, 25693), (486, 25696), (488, 25726), (490, 25747), (509, 25957), (516, 26068), (559, 26527), (561, 26569), (582, 26809), (588, 26869), (590, 26887), (592, 26896),

Gene: PhaoMing_15 Start: 10315, Stop: 14700, Start Num: 4

Candidate Starts for PhaoMing_15:

(Start: 1 @10282 has 51 MA's), (2, 10291), (3, 10297), (4, 10315), (5, 10363), (7, 10372), (9, 10405), (14, 10462), (15, 10471), (18, 10486), (19, 10492), (23, 10549), (24, 10558), (26, 10570), (35, 10648), (38, 10669), (45, 10717), (47, 10741), (52, 10768), (59, 10837), (64, 10879), (67, 10903), (69, 10924), (70, 10927), (71, 10939), (73, 10978), (74, 10987), (84, 11119), (85, 11125), (92, 11230), (93, 11242), (94, 11245), (97, 11284), (101, 11362), (102, 11368), (103, 11380), (104, 11389), (110, 11473), (112,

11515), (115, 11557), (118, 11602), (119, 11623), (120, 11656), (121, 11665), (123, 11719), (124, 11731), (130, 11767), (133, 11788), (134, 11791), (139, 11851), (146, 11878), (147, 11881), (150, 11911), (151, 11914), (154, 11932), (159, 11965), (162, 11989), (173, 12088), (177, 12130), (181, 12193), (182, 12196), (190, 12271), (198, 12325), (199, 12328), (204, 12367), (207, 12388), (208, 12400), (209, 12421), (214, 12454), (215, 12466), (216, 12472), (224, 12532), (225, 12541), (226, 12544), (228, 12553), (230, 12574), (232, 12577), (234, 12583), (235, 12586), (241, 12625), (242, 12631), (243, 12637), (244, 12652), (249, 12688), (252, 12703), (255, 12733), (256, 12736), (257, 12739), (260, 12748), (263, 12757), (267, 12787), (276, 12832), (283, 12865), (288, 12898), (302, 12940), (325, 13036), (340, 13144), (345, 13207), (349, 13246), (357, 13297), (359, 13324), (367, 13399), (373, 13438), (380, 13507), (406, 13699), (423, 13867), (431, 13915), (442, 14038), (446, 14086), (452, 14140), (467, 14269), (492, 14485), (495, 14515), (499, 14551), (504, 14596), (505, 14599), (507, 14632), (510, 14653), (512, 14686),

Gene: Phomeo_38 Start: 24136, Stop: 29529, Start Num: 1

Candidate Starts for Phomeo_38:

(Start: 1 @24136 has 51 MA's), (29, 24463), (31, 24484), (54, 24628), (58, 24673), (63, 24706), (75, 24826), (95, 25075), (99, 25132), (114, 25369), (117, 25399), (119, 25432), (125, 25552), (131, 25582), (143, 25672), (148, 25708), (155, 25756), (156, 25762), (160, 25786), (162, 25807), (163, 25816), (169, 25867), (171, 25897), (207, 26197), (210, 26239), (211, 26242), (219, 26302), (222, 26332), (248, 26470), (250, 26488), (253, 26515), (257, 26536), (258, 26542), (266, 26581), (267, 26584), (279, 26644), (282, 26656), (284, 26665), (294, 26716), (297, 26731), (327, 26869), (329, 26881), (338, 26956), (346, 27043), (360, 27148), (363, 27160), (371, 27253), (376, 27277), (379, 27325), (381, 27340), (385, 27361), (386, 27385), (387, 27394), (388, 27403), (390, 27409), (394, 27445), (398, 27472), (408, 27565), (419, 27673), (427, 27724), (430, 27748), (435, 27775), (437, 27808), (441, 27841), (445, 27898), (449, 27925), (451, 27940), (456, 27997), (464, 28063), (474, 28147), (485, 28255), (486, 28258), (488, 28288), (554, 29062), (559, 29101), (566, 29188), (578, 29296), (582, 29383), (585, 29407), (587, 29431), (590, 29461), (592, 29470),

Gene: Pleakley_48 Start: 24215, Stop: 29758, Start Num: 1

Candidate Starts for Pleakley_48:

(Start: 1 @24215 has 51 MA's), (16, 24404), (21, 24473), (22, 24476), (29, 24539), (31, 24560), (63, 24788), (92, 25139), (95, 25157), (100, 25244), (102, 25271), (109, 25358), (111, 25397), (114, 25451), (117, 25481), (119, 25514), (120, 25547), (124, 25622), (148, 25790), (160, 25868), (162, 25889), (163, 25898), (166, 25922), (169, 25949), (171, 25979), (202, 26249), (207, 26279), (211, 26324), (250, 26570), (253, 26597), (254, 26603), (264, 26645), (271, 26690), (280, 26729), (285, 26753), (293, 26792), (294, 26798), (303, 26834), (306, 26846), (307, 26852), (308, 26855), (313, 26885), (316, 26894), (320, 26909), (330, 26969), (333, 26987), (344, 27098), (350, 27164), (363, 27242), (371, 27359), (376, 27383), (379, 27431), (381, 27446), (384, 27464), (386, 27491), (392, 27542), (399, 27596), (407, 27656), (413, 27743), (416, 27764), (433, 27887), (463, 28205), (464, 28229), (465, 28241), (485, 28421), (515, 28802), (518, 28856), (530, 28946), (560, 29342), (566, 29417), (577, 29522), (582, 29612), (588, 29672), (589, 29687), (592, 29699), (593, 29708),

Gene: Polyky_43 Start: 25221, Stop: 30431, Start Num: 1

Candidate Starts for Polyky_43:

(Start: 1 @25221 has 51 MA's), (16, 25413), (31, 25569), (40, 25623), (41, 25626), (48, 25704), (50, 25719), (81, 26010), (90, 26130), (92, 26157), (107, 26355), (119, 26532), (121, 26574), (125, 26652), (127, 26658), (135, 26730), (136, 26742), (137, 26748), (142, 26769), (148, 26808), (157, 26865), (162, 26907), (163, 26916), (168, 26949), (169, 26967), (171, 26997), (185, 27123), (188, 27156), (192, 27189), (196, 27219), (202, 27267), (203, 27276), (209, 27330), (219, 27402), (220, 27423), (222, 27432), (244, 27588), (252, 27639), (261, 27687), (266, 27720), (272, 27759), (273, 27762), (283, 27813), (284, 27816), (289, 27849), (299, 27891), (303, 27903), (304, 27906), (306, 27915), (314, 27957), (315, 27960), (317, 27966), (320, 27978), (329, 28032), (331, 28044), (350, 28221), (351, 28230), (353, 28233), (361, 28278), (370, 28368), (374, 28386), (395, 28551), (399, 28581),

(400, 28596), (417, 28752), (424, 28764), (428, 28788), (436, 28842), (438, 28875), (442, 28920), (453, 29013), (454, 29022), (456, 29034), (458, 29043), (461, 29064), (462, 29067), (469, 29139), (470, 29142), (473, 29163), (478, 29205), (494, 29355), (497, 29388), (498, 29397), (520, 29634), (525, 29679), (537, 29745), (539, 29751), (540, 29772), (541, 29781), (543, 29802), (547, 29823), (551, 29868), (558, 30009), (578, 30198), (579, 30231), (587, 30333), (588, 30345), (592, 30372),

Gene: Poushou_17 Start: 11629, Stop: 16536, Start Num: 6

Candidate Starts for Poushou_17:

(Start: 6 @11629 has 4 MA's), (42, 11956), (57, 12085), (60, 12124), (66, 12172), (80, 12325), (82, 12370), (92, 12538), (96, 12565), (100, 12649), (103, 12688), (114, 12898), (119, 12961), (121, 13003), (128, 13090), (129, 13099), (131, 13111), (138, 13180), (142, 13198), (144, 13207), (145, 13216), (152, 13270), (155, 13285), (167, 13369), (172, 13429), (175, 13447), (180, 13525), (181, 13534), (183, 13543), (184, 13546), (189, 13606), (192, 13618), (193, 13630), (194, 13639), (211, 13771), (239, 13918), (242, 13936), (246, 13966), (251, 14002), (252, 14008), (255, 14038), (263, 14062), (268, 14065), (283, 14140), (285, 14149), (288, 14170), (289, 14173), (291, 14179), (296, 14203), (297, 14206), (305, 14221), (307, 14233), (312, 14254), (313, 14266), (317, 14278), (319, 14287), (339, 14386), (341, 14398), (343, 14419), (348, 14485), (362, 14575), (365, 14596), (377, 14701), (409, 14980), (425, 15115), (429, 15151), (440, 15253), (443, 15283), (448, 15325), (457, 15403), (475, 15565), (487, 15661), (502, 15802), (506, 15844), (508, 15865), (526, 16063), (528, 16087), (535, 16135), (553, 16384), (557, 16417), (561, 16480), (565, 16513), (567, 16522),

Gene: RedRaider_46 Start: 26371, Stop: 31794, Start Num: 1

Candidate Starts for RedRaider_46:

(Start: 1 @26371 has 51 MA's), (31, 26719), (42, 26779), (43, 26788), (65, 26944), (76, 27061), (92, 27283), (93, 27295), (95, 27301), (111, 27541), (114, 27595), (117, 27625), (119, 27658), (131, 27808), (143, 27898), (148, 27934), (155, 27982), (160, 28012), (162, 28033), (163, 28042), (169, 28093), (171, 28123), (177, 28168), (200, 28366), (207, 28423), (211, 28468), (212, 28474), (219, 28528), (221, 28552), (238, 28633), (253, 28741), (257, 28762), (267, 28810), (282, 28882), (284, 28891), (285, 28897), (294, 28942), (297, 28957), (311, 29011), (316, 29038), (329, 29107), (346, 29269), (354, 29338), (363, 29386), (366, 29446), (371, 29479), (376, 29503), (379, 29551), (381, 29566), (382, 29575), (383, 29578), (386, 29611), (387, 29620), (388, 29629), (389, 29632), (390, 29635), (408, 29791), (412, 29827), (419, 29899), (427, 29947), (435, 29998), (437, 30031), (441, 30064), (445, 30121), (447, 30136), (464, 30286), (465, 30298), (482, 30436), (485, 30478), (486, 30481), (488, 30511), (513, 30805), (515, 30841), (521, 30895), (523, 30916), (531, 30985), (534, 31009), (559, 31366), (562, 31414), (564, 31426), (566, 31453), (568, 31462), (577, 31558), (582, 31648), (587, 31696), (588, 31708), (589, 31723), (592, 31735), (593, 31744),

Gene: Scuba_48 Start: 24292, Stop: 29835, Start Num: 1

Candidate Starts for Scuba_48:

(Start: 1 @24292 has 51 MA's), (16, 24481), (21, 24550), (22, 24553), (29, 24616), (31, 24637), (63, 24865), (92, 25216), (95, 25234), (100, 25321), (102, 25348), (105, 25402), (111, 25474), (114, 25528), (117, 25558), (119, 25591), (120, 25624), (124, 25699), (148, 25867), (160, 25945), (163, 25975), (166, 25999), (169, 26026), (170, 26050), (171, 26056), (202, 26326), (207, 26356), (208, 26368), (211, 26401), (250, 26647), (253, 26674), (254, 26680), (264, 26722), (271, 26767), (280, 26806), (285, 26830), (293, 26869), (294, 26875), (303, 26911), (306, 26923), (307, 26929), (308, 26932), (313, 26962), (316, 26971), (320, 26986), (330, 27046), (333, 27064), (344, 27175), (350, 27241), (363, 27319), (371, 27436), (376, 27460), (379, 27508), (381, 27523), (384, 27541), (386, 27568), (392, 27619), (399, 27673), (407, 27733), (413, 27820), (416, 27841), (433, 27964), (463, 28282), (464, 28306), (465, 28318), (471, 28363), (485, 28498), (515, 28879), (518, 28933), (530, 29023), (533, 29047), (560, 29419), (566, 29494), (577, 29599), (582, 29689), (588, 29749), (589, 29764), (592, 29776), (593, 29785),

Gene: Skysand_41 Start: 24563, Stop: 29992, Start Num: 1

Candidate Starts for Skysand_41:

(Start: 1 @24563 has 51 MA's), (31, 24911), (42, 24971), (43, 24980), (76, 25256), (80, 25298), (92, 25478), (93, 25490), (95, 25496), (110, 25715), (114, 25790), (117, 25820), (119, 25853), (131, 26003), (143, 26093), (148, 26129), (155, 26177), (156, 26183), (160, 26207), (162, 26228), (163, 26237), (169, 26288), (171, 26318), (200, 26561), (207, 26618), (208, 26630), (211, 26663), (212, 26669), (233, 26801), (238, 26828), (253, 26936), (257, 26957), (267, 27005), (284, 27086), (285, 27092), (294, 27137), (297, 27152), (311, 27206), (329, 27302), (346, 27464), (350, 27503), (354, 27533), (363, 27581), (366, 27641), (371, 27674), (376, 27698), (379, 27746), (381, 27761), (382, 27770), (386, 27806), (387, 27815), (388, 27824), (389, 27827), (390, 27830), (408, 27986), (412, 28022), (419, 28094), (427, 28142), (435, 28193), (437, 28226), (441, 28259), (445, 28316), (447, 28331), (464, 28481), (465, 28493), (476, 28580), (482, 28631), (485, 28673), (486, 28676), (488, 28706), (513, 29000), (521, 29090), (523, 29111), (531, 29180), (542, 29267), (559, 29564), (562, 29612), (566, 29651), (582, 29846), (587, 29894), (588, 29906), (589, 29921), (592, 29933), (593, 29942),

Gene: StarStruck_40 Start: 24099, Stop: 29510, Start Num: 1

Candidate Starts for StarStruck_40:

(Start: 1 @24099 has 51 MA's), (8, 24210), (10, 24228), (21, 24360), (31, 24447), (32, 24456), (58, 24633), (63, 24666), (67, 24702), (87, 24954), (92, 25017), (93, 25029), (95, 25035), (114, 25329), (117, 25359), (119, 25392), (125, 25512), (143, 25632), (148, 25668), (155, 25716), (160, 25746), (163, 25776), (169, 25827), (171, 25857), (189, 26037), (200, 26100), (202, 26127), (207, 26157), (211, 26202), (217, 26244), (219, 26262), (222, 26292), (223, 26298), (253, 26475), (258, 26502), (264, 26523), (269, 26559), (275, 26583), (277, 26595), (281, 26613), (282, 26616), (301, 26706), (313, 26763), (321, 26796), (322, 26799), (330, 26847), (331, 26853), (335, 26877), (360, 27108), (363, 27120), (366, 27180), (371, 27213), (375, 27231), (376, 27237), (378, 27279), (379, 27285), (381, 27300), (382, 27309), (383, 27312), (386, 27345), (387, 27354), (388, 27363), (389, 27366), (390, 27369), (408, 27525), (419, 27633), (420, 27636), (427, 27684), (430, 27708), (435, 27735), (437, 27768), (441, 27801), (445, 27858), (451, 27900), (456, 27957), (465, 28035), (474, 28107), (485, 28212), (554, 29040), (559, 29082), (561, 29124), (567, 29175), (578, 29277), (587, 29412), (590, 29442), (592, 29451),

Gene: Sukkupi_41 Start: 23124, Stop: 28529, Start Num: 1

Candidate Starts for Sukkupi_41:

(Start: 1 @23124 has 51 MA's), (8, 23235), (10, 23253), (11, 23283), (17, 23322), (30, 23457), (31, 23472), (51, 23610), (58, 23670), (62, 23697), (63, 23703), (85, 23949), (87, 23991), (92, 24054), (93, 24066), (95, 24072), (113, 24354), (119, 24429), (124, 24537), (131, 24579), (140, 24660), (148, 24705), (155, 24753), (160, 24783), (163, 24813), (169, 24864), (171, 24894), (189, 25074), (191, 25080), (192, 25086), (207, 25194), (211, 25239), (212, 25245), (223, 25335), (240, 25410), (250, 25485), (253, 25512), (257, 25533), (263, 25551), (266, 25578), (289, 25695), (293, 25707), (300, 25740), (302, 25746), (307, 25767), (311, 25782), (313, 25800), (320, 25824), (321, 25833), (334, 25911), (337, 25944), (344, 26013), (350, 26079), (371, 26250), (379, 26322), (381, 26337), (386, 26382), (387, 26391), (388, 26400), (404, 26523), (408, 26562), (412, 26598), (419, 26670), (420, 26673), (427, 26721), (430, 26745), (434, 26769), (435, 26772), (437, 26805), (441, 26838), (444, 26895), (445, 26898), (451, 26940), (456, 26997), (459, 27009), (464, 27063), (466, 27078), (472, 27129), (474, 27147), (477, 27171), (480, 27207), (485, 27267), (486, 27270), (488, 27300), (490, 27321), (509, 27531), (516, 27642), (559, 28101), (561, 28143), (582, 28383), (588, 28443), (590, 28461), (592, 28470),

Gene: SuperSulley_40 Start: 24297, Stop: 29702, Start Num: 1

Candidate Starts for SuperSulley_40:

(Start: 1 @24297 has 51 MA's), (10, 24426), (31, 24645), (32, 24654), (63, 24858), (87, 25146), (92, 25209), (93, 25221), (95, 25227), (114, 25521), (117, 25551), (119, 25584), (123, 25680), (125, 25704), (131, 25734), (143, 25824), (148, 25860), (155, 25908), (156, 25914), (158, 25923), (160,

25938), (162, 25959), (163, 25968), (169, 26019), (171, 26049), (200, 26292), (202, 26319), (203, 26328), (207, 26349), (211, 26394), (219, 26454), (221, 26478), (223, 26490), (253, 26667), (263, 26706), (265, 26727), (271, 26760), (278, 26793), (279, 26796), (284, 26817), (285, 26823), (293, 26862), (294, 26868), (298, 26889), (303, 26904), (308, 26925), (316, 26964), (320, 26979), (321, 26988), (323, 26997), (326, 27009), (330, 27039), (331, 27045), (332, 27048), (337, 27099), (341, 27123), (344, 27165), (345, 27177), (360, 27297), (363, 27309), (366, 27369), (371, 27402), (375, 27420), (376, 27426), (379, 27474), (381, 27489), (382, 27498), (383, 27501), (386, 27534), (387, 27543), (388, 27552), (390, 27558), (408, 27714), (419, 27822), (420, 27825), (427, 27873), (430, 27897), (435, 27924), (437, 27957), (441, 27990), (445, 28047), (451, 28089), (455, 28137), (456, 28146), (458, 28155), (465, 28224), (472, 28278), (474, 28296), (476, 28311), (480, 28353), (482, 28362), (485, 28404), (486, 28407), (488, 28437), (489, 28449), (555, 29241), (559, 29274), (561, 29316), (567, 29367), (582, 29556), (587, 29604), (590, 29634), (592, 29643), (594, 29667),

Gene: TouchMeNot_17 Start: 11629, Stop: 16536, Start Num: 6

Candidate Starts for TouchMeNot_17:

(Start: 6 @11629 has 4 MA's), (42, 11956), (57, 12085), (60, 12124), (66, 12172), (80, 12325), (82, 12370), (92, 12538), (96, 12565), (100, 12649), (103, 12688), (114, 12898), (119, 12961), (121, 13003), (128, 13090), (129, 13099), (131, 13111), (138, 13180), (142, 13198), (144, 13207), (145, 13216), (152, 13270), (155, 13285), (167, 13369), (172, 13429), (175, 13447), (180, 13525), (181, 13534), (183, 13543), (184, 13546), (189, 13606), (192, 13618), (193, 13630), (194, 13639), (211, 13771), (239, 13918), (242, 13936), (246, 13966), (251, 14002), (252, 14008), (255, 14038), (263, 14062), (268, 14065), (283, 14140), (285, 14149), (288, 14170), (289, 14173), (291, 14179), (296, 14203), (297, 14206), (305, 14221), (307, 14233), (312, 14254), (313, 14266), (317, 14278), (319, 14287), (339, 14386), (341, 14398), (343, 14419), (348, 14485), (362, 14575), (365, 14596), (377, 14701), (409, 14980), (425, 15115), (429, 15151), (440, 15253), (443, 15283), (448, 15325), (457, 15403), (475, 15565), (487, 15661), (502, 15802), (506, 15844), (508, 15865), (526, 16063), (528, 16087), (535, 16135), (553, 16384), (557, 16417), (561, 16480), (565, 16513), (567, 16522),

Gene: Tracker_39 Start: 23264, Stop: 28657, Start Num: 1

Candidate Starts for Tracker_39:

(Start: 1 @23264 has 51 MA's), (29, 23591), (31, 23612), (54, 23756), (58, 23801), (63, 23834), (75, 23954), (95, 24203), (99, 24260), (114, 24497), (117, 24527), (119, 24560), (125, 24680), (131, 24710), (143, 24800), (148, 24836), (155, 24884), (156, 24890), (160, 24914), (162, 24935), (163, 24944), (169, 24995), (171, 25025), (207, 25325), (210, 25367), (211, 25370), (219, 25430), (222, 25460), (248, 25598), (250, 25616), (253, 25643), (257, 25664), (258, 25670), (266, 25709), (267, 25712), (279, 25772), (282, 25784), (284, 25793), (294, 25844), (297, 25859), (321, 25964), (327, 25997), (329, 26009), (338, 26084), (346, 26171), (360, 26276), (363, 26288), (371, 26381), (376, 26405), (379, 26453), (381, 26468), (385, 26489), (386, 26513), (387, 26522), (388, 26531), (390, 26537), (394, 26573), (398, 26600), (408, 26693), (419, 26801), (427, 26852), (430, 26876), (435, 26903), (437, 26936), (441, 26969), (445, 27026), (449, 27053), (451, 27068), (456, 27125), (464, 27191), (474, 27275), (485, 27383), (486, 27386), (488, 27416), (554, 28190), (559, 28229), (566, 28316), (578, 28424), (582, 28511), (585, 28535), (587, 28559), (590, 28589), (592, 28598),

Gene: Turuncu_43 Start: 24570, Stop: 29978, Start Num: 1

Candidate Starts for Turuncu_43:

(Start: 1 @24570 has 51 MA's), (16, 24762), (37, 24951), (43, 24987), (62, 25134), (76, 25269), (92, 25491), (95, 25509), (114, 25803), (117, 25833), (119, 25866), (131, 26016), (135, 26064), (140, 26097), (148, 26142), (155, 26190), (160, 26220), (163, 26250), (169, 26301), (171, 26331), (192, 26523), (200, 26574), (207, 26631), (210, 26673), (211, 26676), (237, 26826), (253, 26949), (258, 26976), (264, 26997), (275, 27057), (277, 27069), (280, 27081), (282, 27090), (288, 27129), (309, 27210), (310, 27216), (313, 27237), (318, 27252), (322, 27273), (329, 27315), (335, 27351), (360, 27582), (363, 27594), (371, 27687), (376, 27711), (379, 27759), (381, 27774), (386, 27819), (387, 27828), (388, 27837), (390, 27843), (408, 27999), (419, 28107), (420, 28110), (427, 28158), (430,

28182), (434, 28206), (435, 28209), (437, 28242), (441, 28275), (444, 28332), (445, 28335), (451, 28377), (456, 28434), (469, 28548), (472, 28566), (474, 28584), (476, 28599), (485, 28689), (491, 28746), (524, 29124), (545, 29301), (559, 29550), (576, 29739), (582, 29832), (587, 29880), (589, 29907), (592, 29919),

Gene: Wheezy_39 Start: 23469, Stop: 28862, Start Num: 1

Candidate Starts for Wheezy_39:

(Start: 1 @23469 has 51 MA's), (29, 23796), (31, 23817), (54, 23961), (58, 24006), (63, 24039), (75, 24159), (95, 24408), (99, 24465), (109, 24609), (114, 24702), (117, 24732), (119, 24765), (125, 24885), (131, 24915), (143, 25005), (148, 25041), (155, 25089), (156, 25095), (160, 25119), (162, 25140), (163, 25149), (169, 25200), (171, 25230), (207, 25530), (210, 25572), (211, 25575), (219, 25635), (222, 25665), (248, 25803), (250, 25821), (253, 25848), (257, 25869), (258, 25875), (266, 25914), (267, 25917), (279, 25977), (282, 25989), (284, 25998), (294, 26049), (297, 26064), (327, 26202), (329, 26214), (338, 26289), (346, 26376), (360, 26481), (363, 26493), (371, 26586), (376, 26610), (379, 26658), (381, 26673), (385, 26694), (386, 26718), (387, 26727), (388, 26736), (390, 26742), (394, 26778), (408, 26898), (419, 27006), (427, 27057), (430, 27081), (435, 27108), (437, 27141), (441, 27174), (445, 27231), (449, 27258), (451, 27273), (456, 27330), (464, 27396), (474, 27480), (485, 27588), (486, 27591), (488, 27621), (554, 28395), (559, 28434), (566, 28521), (578, 28629), (582, 28716), (585, 28740), (587, 28764), (590, 28794), (592, 28803),

Gene: WhoseManz_41 Start: 21176, Stop: 26575, Start Num: 1

Candidate Starts for WhoseManz_41:

(Start: 1 @21176 has 51 MA's), (8, 21287), (10, 21305), (11, 21335), (17, 21374), (30, 21509), (31, 21524), (51, 21662), (62, 21749), (63, 21755), (87, 22043), (92, 22106), (93, 22118), (95, 22124), (113, 22406), (119, 22481), (124, 22589), (131, 22631), (140, 22712), (148, 22757), (155, 22805), (160, 22835), (163, 22865), (169, 22916), (171, 22946), (189, 23126), (191, 23132), (192, 23138), (207, 23246), (211, 23291), (212, 23297), (240, 23462), (243, 23483), (250, 23537), (253, 23564), (257, 23585), (263, 23603), (266, 23630), (289, 23747), (293, 23759), (300, 23792), (302, 23798), (307, 23819), (311, 23834), (313, 23852), (320, 23876), (321, 23885), (334, 23963), (344, 24065), (350, 24131), (371, 24302), (379, 24374), (381, 24389), (386, 24434), (387, 24443), (388, 24452), (404, 24575), (408, 24614), (418, 24719), (419, 24722), (422, 24734), (434, 24815), (435, 24818), (437, 24851), (441, 24884), (444, 24941), (445, 24944), (451, 24986), (456, 25043), (459, 25055), (464, 25109), (466, 25124), (472, 25175), (474, 25193), (477, 25217), (480, 25253), (485, 25313), (486, 25316), (488, 25346), (490, 25367), (509, 25577), (516, 25688), (559, 26147), (561, 26189), (582, 26429), (588, 26489), (590, 26507), (592, 26516),

Gene: Yndexa_41 Start: 23124, Stop: 28529, Start Num: 1

Candidate Starts for Yndexa_41:

(Start: 1 @23124 has 51 MA's), (8, 23235), (10, 23253), (11, 23283), (17, 23322), (30, 23457), (31, 23472), (51, 23610), (58, 23670), (62, 23697), (63, 23703), (85, 23949), (87, 23991), (92, 24054), (93, 24066), (95, 24072), (113, 24354), (119, 24429), (124, 24537), (131, 24579), (140, 24660), (148, 24705), (155, 24753), (160, 24783), (163, 24813), (169, 24864), (171, 24894), (189, 25074), (191, 25080), (192, 25086), (207, 25194), (211, 25239), (212, 25245), (223, 25335), (240, 25410), (250, 25485), (253, 25512), (257, 25533), (263, 25551), (266, 25578), (289, 25695), (293, 25707), (300, 25740), (302, 25746), (307, 25767), (311, 25782), (313, 25800), (320, 25824), (321, 25833), (334, 25911), (337, 25944), (344, 26013), (350, 26079), (371, 26250), (379, 26322), (381, 26337), (386, 26382), (387, 26391), (388, 26400), (404, 26523), (408, 26562), (412, 26598), (419, 26670), (420, 26673), (427, 26721), (430, 26745), (434, 26769), (435, 26772), (437, 26805), (441, 26838), (444, 26895), (445, 26898), (451, 26940), (456, 26997), (459, 27009), (464, 27063), (466, 27078), (472, 27129), (474, 27147), (477, 27171), (480, 27207), (485, 27267), (486, 27270), (488, 27300), (490, 27321), (509, 27531), (516, 27642), (559, 28101), (561, 28143), (582, 28383), (588, 28443), (590, 28461), (592, 28470),