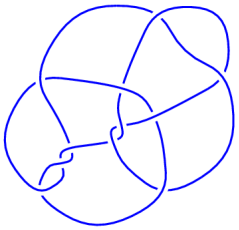
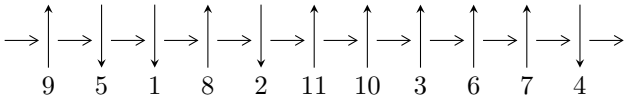
$11a_{294}$ $(K11a_{294})$



[1]

Arc Sequences



Solving Sequence

$$\underset{c_{11}}{4,11} \longrightarrow \underset{c_3}{1} \longrightarrow \underset{c_6}{3,7} \longrightarrow \underset{c_{10}}{6} \longrightarrow \underset{c_7}{10} \longrightarrow \underset{c_4}{8} \longrightarrow \underset{c_2}{5} \longrightarrow \underset{c_9}{2} \longrightarrow 9 \twoheadrightarrow c_1, c_5, c_8$$

Representation Ideals

$$I = \bigcap_{i=1}^{3} I_i^u$$

$I_1^u = \langle 8u^3 - 12u^2 + 36u - 5,\ b + 1,\ -16u^2 + 15a + 24u - 62 \rangle$

$I_2^u = \langle 8u^{24} + 28u^{23} + \cdots - 55u - 19,$
$\quad - 1.05794 \times 10^{61} u^{23} - 3.92592 \times 10^{61} u^{22} + \cdots + 2.40811 \times 10^{62} b + 1.05881 \times 10^{62},$
$\quad 3.86381 \times 10^{62} u^{23} + 9.84893 \times 10^{62} u^{22} + \cdots + 4.57541 \times 10^{63} a - 1.56602 \times 10^{64} \rangle$

$I_3^u = \langle u^{40} - 13u^{39} + \cdots + 626914u + 73649,$
$\quad 4.47814 \times 10^{186} u^{39} - 5.95363 \times 10^{187} u^{38} + \cdots + 1.42011 \times 10^{191} b + 9.27385 \times 10^{191},$
$\quad - 5.77310 \times 10^{190} u^{39} + 7.72710 \times 10^{191} u^{38} + \cdots + 2.25066 \times 10^{195} a - 1.60098 \times 10^{196} \rangle$

There are 3 irreducible components with 67 representations.

[1] The knot diagram image is adapter from "C. Livingston and A. H. Moore, KnotInfo: Table of Knot Invariants, http://www.indiana.edu/ knotinfo"

I. $I_1^u = \langle 8u^3 - 12u^2 + 36u - 5,\ b + 1,\ -16u^2 + 15a + 24u - 62 \rangle$

(i) Arc colorings

$$a_4 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} \frac{16}{15}u^2 - \frac{8}{5}u + \frac{62}{15} \\ -1 \end{pmatrix}$$

$$a_1 = \begin{pmatrix} \frac{16}{15}u^2 - \frac{8}{5}u + \frac{77}{15} \\ -1 \end{pmatrix}$$

$$a_3 = \begin{pmatrix} \frac{16}{15}u^2 - \frac{8}{5}u + \frac{92}{15} \\ -1 \end{pmatrix}$$

$$a_7 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$

$$a_6 = \begin{pmatrix} -\frac{32}{45}u^2 + \frac{28}{45}u - \frac{104}{45} \\ \frac{1}{3}u + \frac{2}{3} \end{pmatrix}$$

$$a_{10} = \begin{pmatrix} \frac{16}{15}u^2 - \frac{8}{5}u + \frac{62}{15} \\ -\frac{2}{3}u^2 + \frac{2}{3}u - 1 \end{pmatrix}$$

$$a_8 = \begin{pmatrix} \frac{32}{45}u^2 - \frac{28}{45}u + \frac{104}{45} \\ -\frac{2}{9}u^2 + \frac{1}{9}u - \frac{7}{18} \end{pmatrix}$$

$$a_5 = \begin{pmatrix} \frac{8}{45}u^2 - \frac{22}{45}u + \frac{86}{45} \\ \frac{1}{6}u - \frac{1}{6} \end{pmatrix}$$

$$a_2 = \begin{pmatrix} \frac{8}{9}u^2 - \frac{10}{9}u + \frac{38}{9} \\ -\frac{1}{6}u - \frac{5}{6} \end{pmatrix}$$

$$a_9 = \begin{pmatrix} \frac{32}{45}u^2 - \frac{28}{45}u + \frac{104}{45} \\ -\frac{2}{9}u^2 + \frac{1}{9}u - \frac{7}{18} \end{pmatrix}$$

$$a_9 = \begin{pmatrix} \frac{32}{45}u^2 - \frac{28}{45}u + \frac{104}{45} \\ -\frac{2}{9}u^2 + \frac{1}{9}u - \frac{7}{18} \end{pmatrix}$$

(ii) Obstruction class $= 1$

(iii) Cusp Shapes =unknown

(iv) Complex Volumes and Cusp Shapes

Solution to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = \quad 0.145240$ $a = \quad 3.92345$ $b = -1.00000$	-0.531480	-2.14246
$u = \quad 0.67738 - 1.96071I$ $a = -0.561725 + 0.303758I$ $b = -1.00000$	$-4.66906 + 2.82812I$	$-2.05377 - 0.32679I$
$u = \quad 0.67738 + 1.96071I$ $a = -0.561725 - 0.303758I$ $b = -1.00000$	$-4.66906 - 2.82812I$	$-2.05377 + 0.32679I$

II. $I_2^u = \langle 8u^{24} + 28u^{23} + \cdots - 55u - 19,\ -1.06 \times 10^{61}u^{23} - 3.93 \times 10^{61}u^{22} + \cdots + 2.41 \times 10^{62}b + 1.06 \times 10^{62},\ 3.86 \times 10^{62}u^{23} + 9.85 \times 10^{62}u^{22} + \cdots + 4.58 \times 10^{63}a - 1.57 \times 10^{64} \rangle$

(i) Arc colorings

$$a_4 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} -0.0844473u^{23} - 0.215258u^{22} + \cdots - 11.0860u + 3.42269 \\ 0.0439323u^{23} + 0.163029u^{22} + \cdots + 5.84793u - 0.439687 \end{pmatrix}$$

$$a_1 = \begin{pmatrix} -0.128380u^{23} - 0.378287u^{22} + \cdots - 16.9339u + 3.86238 \\ 0.0439323u^{23} + 0.163029u^{22} + \cdots + 5.84793u - 0.439687 \end{pmatrix}$$

$$a_3 = \begin{pmatrix} 0.130844u^{23} + 0.637662u^{22} + \cdots - 10.6042u + 8.03456 \\ -0.0935150u^{23} - 0.367916u^{22} + \cdots + 0.0561641u - 1.85680 \end{pmatrix}$$

$$a_7 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$

$$a_6 = \begin{pmatrix} -0.382464u^{23} - 1.42112u^{22} + \cdots - 20.0294u - 0.126278 \\ 0.139094u^{23} + 0.513972u^{22} + \cdots + 6.43440u + 0.0886571 \end{pmatrix}$$

$$a_{10} = \begin{pmatrix} -0.0844473u^{23} - 0.215258u^{22} + \cdots - 11.0860u + 3.42269 \\ 0.0761201u^{23} + 0.280276u^{22} + \cdots + 6.19948u - 0.248955 \end{pmatrix}$$

$$a_8 = \begin{pmatrix} 0.382464u^{23} + 1.42112u^{22} + \cdots + 20.0294u + 0.126278 \\ -0.0966189u^{23} - 0.360821u^{22} + \cdots - 2.95890u + 0.107267 \end{pmatrix}$$

$$a_5 = \begin{pmatrix} -0.365909u^{23} - 1.35783u^{22} + \cdots - 18.6240u + 0.104188 \\ 0.127545u^{23} + 0.472822u^{22} + \cdots + 5.65726u + 0.596862 \end{pmatrix}$$

$$a_2 = \begin{pmatrix} -0.164856u^{23} - 0.601423u^{22} + \cdots - 6.51753u + 3.87247 \\ 0.0770245u^{23} + 0.316896u^{22} + \cdots + 1.78226u - 0.777065 \end{pmatrix}$$

$$a_9 = \begin{pmatrix} -0.189951u^{23} - 0.634417u^{22} + \cdots - 12.5559u - 0.150964 \\ 0.147898u^{23} + 0.532508u^{22} + \cdots + 6.49808u + 0.699449 \end{pmatrix}$$

$$a_9 = \begin{pmatrix} -0.189951u^{23} - 0.634417u^{22} + \cdots - 12.5559u - 0.150964 \\ 0.147898u^{23} + 0.532508u^{22} + \cdots + 6.49808u + 0.699449 \end{pmatrix}$$

(ii) Obstruction class $= -1$

(iii) Cusp Shapes =unknown

(iv) Complex Volumes and Cusp Shapes

Solution to I_2^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-1.08345-2.22165I$ $a=-0.423759-0.325330I$ $b=-1.347431+0.188650I$	$-4.17750-3.32302I$	$7.49326+7.01534I$
$u=-1.08345+2.22165I$ $a=-0.423759+0.325330I$ $b=-1.347431-0.188650I$	$-4.17750+3.32302I$	$7.49326-7.01534I$
$u=-0.95301-2.80249I$ $a=\ \ 0.487188+0.034000I$ $b=\ \ 0.55509-1.37302I$	$4.2704+16.0735I$	$4.86533-8.67439I$
$u=-0.95301+2.80249I$ $a=\ \ 0.487188-0.034000I$ $b=\ \ 0.55509+1.37302I$	$4.2704-16.0735I$	$4.86533+8.67439I$
$u=-0.672132-1.021388I$ $a=\ \ 0.532627-0.501555I$ $b=\ \ 0.49469-1.37599I$	$9.3482+11.6156I$	$9.04984-7.14425I$
$u=-0.672132+1.021388I$ $a=\ \ 0.532627+0.501555I$ $b=\ \ 0.49469+1.37599I$	$9.3482-11.6156I$	$9.04984+7.14425I$
$u=-0.67062-1.40074I$ $a=-0.944539-0.128693I$ $b=-0.207861+1.159743I$	$2.26090+6.77325I$	$8.15326-8.68487I$
$u=-0.67062+1.40074I$ $a=-0.944539+0.128693I$ $b=-0.207861-1.159743I$	$2.26090-6.77325I$	$8.15326+8.68487I$
$u=-0.323179-0.600704I$ $a=-1.06518+1.12737I$ $b=-0.047276+1.186362I$	$7.49230+1.49785I$	$16.5794-3.5131I$
$u=-0.323179+0.600704I$ $a=-1.06518-1.12737I$ $b=-0.047276-1.186362I$	$7.49230-1.49785I$	$16.5794+3.5131I$

Solution to I_2^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-0.240357-0.464460I$ $a=-0.147711-0.695555I$ $b=-0.662890-0.292141I$	$-1.22051-0.86188I$	$-4.63925+4.32694I$
$u=-0.240357+0.464460I$ $a=-0.147711+0.695555I$ $b=-0.662890+0.292141I$	$-1.22051+0.86188I$	$-4.63925-4.32694I$
$u=-0.199601-1.034128I$ $a=\ \ 1.210010+0.409226I$ $b=\ \ 0.263704-0.229700I$	$-3.41691-2.41506I$	$4.35202+1.54076I$
$u=-0.199601+1.034128I$ $a=\ \ 1.210010-0.409226I$ $b=\ \ 0.263704+0.229700I$	$-3.41691+2.41506I$	$4.35202-1.54076I$
$u=-0.127345$ $a=\ \ 5.15582$ $b=-1.29551$	-0.112715	17.2961
$u=-0.01988-2.52445I$ $a=-0.524877-0.044897I$ $b=-0.912691-0.587846I$	$-5.99931-2.29383I$	$-3.48033+0.30083I$
$u=-0.01988+2.52445I$ $a=-0.524877+0.044897I$ $b=-0.912691+0.587846I$	$-5.99931+2.29383I$	$-3.48033-0.30083I$
$u=\ \ 0.319821$ $a=\ \ 1.55353$ $b=\ \ 0.161437$	0.853473	12.2559
$u=\ \ 0.377294-0.111308I$ $a=-0.50306-2.85399I$ $b=\ \ 0.411983+1.346681I$	$6.85359-6.74871I$	$7.12828+3.44529I$
$u=\ \ 0.377294+0.111308I$ $a=-0.50306+2.85399I$ $b=\ \ 0.411983-1.346681I$	$6.85359+6.74871I$	$7.12828-3.44529I$

	Solution to I_2^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=$	$0.462655-0.549485I$		
$a=$	$1.57538-0.03156I$	$5.61526-4.36903I$	$11.9512+7.5869I$
$b=$	$0.138302+1.193198I$		
$u=$	$0.462655+0.549485I$		
$a=$	$1.57538+0.03156I$	$5.61526+4.36903I$	$11.9512-7.5869I$
$b=$	$0.138302-1.193198I$		
$u=$	$1.47604-1.42382I$		
$a=$	$0.554507-0.495537I$	$-2.48001-6.89114I$	$2.89593+8.03535I$
$b=$	$0.381421+1.074635I$		
$u=$	$1.47604+1.42382I$		
$a=$	$0.554507+0.495537I$	$-2.48001+6.89114I$	$2.89593-8.03535I$
$b=$	$0.381421-1.074635I$		

III. $I_3^u = \langle u^{40} - 13u^{39} + \cdots + 626914u + 73649,\ 4.48 \times 10^{186}u^{39} - 5.95 \times 10^{187}u^{38} + \cdots + 1.42 \times 10^{191}b + 9.27 \times 10^{191},\ -5.77 \times 10^{190}u^{39} + 7.73 \times 10^{191}u^{38} + \cdots + 2.25 \times 10^{195}a - 1.60 \times 10^{196} \rangle$

(i) Arc colorings

$$a_4 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} 0.0000256507u^{39} - 0.000343326u^{38} + \cdots + 34.0655u + 7.11336 \\ -0.0000315338u^{39} + 0.000419238u^{38} + \cdots - 40.1918u - 6.53038 \end{pmatrix}$$

$$a_1 = \begin{pmatrix} 0.0000571845u^{39} - 0.000762563u^{38} + \cdots + 74.2574u + 13.6437 \\ -0.0000315338u^{39} + 0.000419238u^{38} + \cdots - 40.1918u - 6.53038 \end{pmatrix}$$

$$a_3 = \begin{pmatrix} -0.0000170175u^{39} + 0.000220286u^{38} + \cdots - 37.5410u - 8.04810 \\ 1.27554 \times 10^{-6}u^{39} - 0.0000137952u^{38} + \cdots + 6.69717u + 1.07317 \end{pmatrix}$$

$$a_7 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$

$$a_6 = \begin{pmatrix} -0.0000352108u^{39} + 0.000467252u^{38} + \cdots - 43.6343u - 6.93531 \\ 1.84570 \times 10^{-6}u^{39} - 0.0000245519u^{38} + \cdots + 2.89392u + 1.15938 \end{pmatrix}$$

$$a_{10} = \begin{pmatrix} 0.0000256507u^{39} - 0.000343326u^{38} + \cdots + 34.0655u + 7.11336 \\ -0.0000264642u^{39} + 0.000351338u^{38} + \cdots - 35.8951u - 5.80368 \end{pmatrix}$$

$$a_8 = \begin{pmatrix} 0.0000352108u^{39} - 0.000467252u^{38} + \cdots + 43.6343u + 6.93531 \\ -2.21794 \times 10^{-7}u^{39} + 3.30131 \times 10^{-6}u^{38} + \cdots + 2.47624u - 0.458807 \end{pmatrix}$$

$$a_5 = \begin{pmatrix} 0.0000375864u^{39} - 0.000497048u^{38} + \cdots + 52.2809u + 9.24705 \\ -1.89048 \times 10^{-6}u^{39} + 0.0000257009u^{38} + \cdots + 2.28051u - 0.189431 \end{pmatrix}$$

$$a_2 = \begin{pmatrix} 9.68547 \times 10^{-7}u^{39} - 0.0000154929u^{38} + \cdots - 4.28672u - 1.14591 \\ -0.0000134399u^{39} + 0.000179530u^{38} + \cdots - 14.5462u - 1.68185 \end{pmatrix}$$

$$a_9 = \begin{pmatrix} 0.0000481625u^{39} - 0.000642220u^{38} + \cdots + 62.4536u + 10.3506 \\ -0.0000278171u^{39} + 0.000370641u^{38} + \cdots - 34.3838u - 5.98284 \end{pmatrix}$$

$$a_9 = \begin{pmatrix} 0.0000481625u^{39} - 0.000642220u^{38} + \cdots + 62.4536u + 10.3506 \\ -0.0000278171u^{39} + 0.000370641u^{38} + \cdots - 34.3838u - 5.98284 \end{pmatrix}$$

(ii) Obstruction class $= -1$

(iii) Cusp Shapes =unknown

(iv) Complex Volumes and Cusp Shapes

Solution to I_3^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-1.66081-1.21289I$ $a=-0.411363-0.544801I$ $b=-0.495392+0.955288I$	$-4.68486+2.84648I$	$-1.60998-2.97861I$
$u=-1.66081+1.21289I$ $a=-0.411363+0.544801I$ $b=-0.495392-0.955288I$	$-4.68486-2.84648I$	$-1.60998+2.97861I$
$u=-0.81339-2.73407I$ $a=\ \ 0.456132+0.015900I$ $b=\ \ 0.67909-1.31567I$	$4.94645+3.96853I$	$7.89349-3.79787I$
$u=-0.81339+2.73407I$ $a=\ \ 0.456132-0.015900I$ $b=\ \ 0.67909+1.31567I$	$4.94645-3.96853I$	$7.89349+3.79787I$
$u=-0.760382-0.894228I$ $a=-1.040612-0.554329I$ $b=-0.392505+0.067994I$	$-1.14075+4.43308I$	$0.68370-2.52728I$
$u=-0.760382+0.894228I$ $a=-1.040612+0.554329I$ $b=-0.392505-0.067994I$	$-1.14075-4.43308I$	$0.68370+2.52728I$
$u=-0.504541-0.250436I$ $a=\ \ 1.28117+1.48403I$ $b=-0.31766-1.39547I$	$2.02098-2.13456I$	$4.50898+2.16962I$
$u=-0.504541+0.250436I$ $a=\ \ 1.28117-1.48403I$ $b=-0.31766+1.39547I$	$2.02098+2.13456I$	$4.50898-2.16962I$
$u=-0.483471-0.543967I$ $a=-0.471578+0.853615I$ $b=-0.162072-0.252940I$	$3.61438-0.81573I$	$5.67172+1.07888I$
$u=-0.483471+0.543967I$ $a=-0.471578-0.853615I$ $b=-0.162072+0.252940I$	$3.61438+0.81573I$	$5.67172-1.07888I$

Solution to I_3^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-0.358112-0.792226I$ $a=\ \ 0.365910-0.809477I$ $b=\ \ 0.56866-1.40361I$	8.84775	12.4403
$u=-0.358112+0.792226I$ $a=\ \ 0.365910+0.809477I$ $b=\ \ 0.56866+1.40361I$	8.84775	12.4403
$u=-0.326834-0.046393I$ $a=-0.88678-1.90377I$ $b=-0.195325+1.163084I$	$1.62333+2.35832I$	$2.35225-4.49783I$
$u=-0.326834+0.046393I$ $a=-0.88678+1.90377I$ $b=-0.195325-1.163084I$	$1.62333-2.35832I$	$2.35225+4.49783I$
$u=-0.152118-0.263221I$ $a=\ \ 1.70861-1.94967I$ $b=\ \ 1.084143-0.080482I$	$4.77271+6.07240I$	$7.45285-5.87540I$
$u=-0.152118+0.263221I$ $a=\ \ 1.70861+1.94967I$ $b=\ \ 1.084143+0.080482I$	$4.77271-6.07240I$	$7.45285+5.87540I$
$u=\ \ 0.11121-2.05637I$ $a=\ \ 0.681235-0.025942I$ $b=\ \ 0.676901-0.349305I$	$-4.68486-2.84648I$	$-1.60998+2.97861I$
$u=\ \ 0.11121+2.05637I$ $a=\ \ 0.681235+0.025942I$ $b=\ \ 0.676901+0.349305I$	$-4.68486+2.84648I$	$-1.60998-2.97861I$
$u=\ \ 0.491223-1.031985I$ $a=-0.411720-0.553165I$ $b=-0.49433-1.41099I$	$4.77271-6.07240I$	$7.45285+5.87540I$
$u=\ \ 0.491223+1.031985I$ $a=-0.411720+0.553165I$ $b=-0.49433+1.41099I$	$4.77271+6.07240I$	$7.45285-5.87540I$

Solution to I_3^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.52676 - 2.30995I$		
$a = 0.584117 - 0.005247I$	$-1.14075 - 4.43308I$	$0.68370 + 2.52728I$
$b = 0.177275 + 1.088718I$		
$u = 0.52676 + 2.30995I$		
$a = 0.584117 + 0.005247I$	$-1.14075 + 4.43308I$	$0.68370 - 2.52728I$
$b = 0.177275 - 1.088718I$		
$u = 0.64691 - 2.22991I$		
$a = 0.522172 - 0.298669I$	$0.00745 + 10.05773I$	$2.70834 - 7.26612I$
$b = 1.159931 + 0.023595I$		
$u = 0.64691 + 2.22991I$		
$a = 0.522172 + 0.298669I$	$0.00745 - 10.05773I$	$2.70834 + 7.26612I$
$b = 1.159931 - 0.023595I$		
$u = 0.781853 - 1.114078I$		
$a = 0.386131 + 0.350456I$	$3.61438 - 0.81573I$	$5.67172 + 1.07888I$
$b = 0.049861 + 1.112720I$		
$u = 0.781853 + 1.114078I$		
$a = 0.386131 - 0.350456I$	$3.61438 + 0.81573I$	$5.67172 - 1.07888I$
$b = 0.049861 - 1.112720I$		
$u = 0.80861 - 1.35056I$		
$a = 0.493329 - 0.498801I$	$2.02098 - 2.13456I$	$4.50898 + 2.16962I$
$b = 0.918130 + 0.259874I$		
$u = 0.80861 + 1.35056I$		
$a = 0.493329 + 0.498801I$	$2.02098 + 2.13456I$	$4.50898 - 2.16962I$
$b = 0.918130 - 0.259874I$		
$u = 0.844096 - 0.403459I$		
$a = 0.500104 - 0.546840I$	$1.62333 - 2.35832I$	$2.35225 + 4.49783I$
$b = 0.502025 + 0.160176I$		
$u = 0.844096 + 0.403459I$		
$a = 0.500104 + 0.546840I$	$1.62333 + 2.35832I$	$2.35225 - 4.49783I$
$b = 0.502025 - 0.160176I$		

Solution to I_3^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.91555 - 2.78902I$ $a = -0.474288 + 0.038017I$ $b = -0.59445 - 1.40555I$	$0.00745 - 10.05773I$	$2.70834 + 7.26612I$
$u = 0.91555 + 2.78902I$ $a = -0.474288 - 0.038017I$ $b = -0.59445 + 1.40555I$	$0.00745 + 10.05773I$	$2.70834 - 7.26612I$
$u = 1.091614 - 0.029291I$ $a = -0.268886 - 1.161496I$ $b = 0.46464 + 1.49110I$	$4.94645 + 3.96853I$	$7.89349 - 3.79787I$
$u = 1.091614 + 0.029291I$ $a = -0.268886 + 1.161496I$ $b = 0.46464 - 1.49110I$	$4.94645 - 3.96853I$	$7.89349 + 3.79787I$
$u = 1.57442 - 1.04400I$ $a = 0.158299 + 0.104969I$ $b = 0.123906 - 1.022770I$	3.97005	10.7621
$u = 1.57442 + 1.04400I$ $a = 0.158299 - 0.104969I$ $b = 0.123906 + 1.022770I$	3.97005	10.7621
$u = 1.70169 - 2.85703I$ $a = -0.289725 + 0.242054I$ $b = -0.199750 - 0.784968I$	$0.52569 + 2.16136I$	$0.73748 - 3.31855I$
$u = 1.70169 + 2.85703I$ $a = -0.289725 - 0.242054I$ $b = -0.199750 + 0.784968I$	$0.52569 - 2.16136I$	$0.73748 + 3.31855I$
$u = 2.06573 - 0.42182I$ $a = -0.025375 + 0.594923I$ $b = -0.053071 + 1.161370I$	$0.52569 + 2.16136I$	$0.73748 - 3.31855I$
$u = 2.06573 + 0.42182I$ $a = -0.025375 - 0.594923I$ $b = -0.053071 - 1.161370I$	$0.52569 - 2.16136I$	$0.73748 + 3.31855I$

IV. u-Polynomials

Crossings	u-Polynomials at each crossings
c_1	$(8u^3+4u^2-1)(8u^{24}+12u^{23}+\cdots+u+1)$ $(u^{40}+3u^{39}+\cdots+60100u+13049)$
c_2, c_{11}	$(u-1)^3(u^{24}-3u^{23}+\cdots-6u-1)(u^{40}+7u^{39}+\cdots+2u+1)$
c_3	$(u+1)^3(u^{24}-3u^{23}+\cdots-6u-1)(u^{40}+7u^{39}+\cdots+2u+1)$
c_4	$(8u^3-4u^2+1)(8u^{24}+12u^{23}+\cdots+u+1)$ $(u^{40}+3u^{39}+\cdots+60100u+13049)$
c_5	$(u+1)^3(u^{24}-3u^{23}+\cdots-6u-1)(u^{40}+7u^{39}+\cdots+2u+1)$
c_6, c_7	(u^3+u^2+2u+1) $(-1+2u+u^2+u^3+9u^4-4u^5-2u^6-10u^7-25u^8+2u^9-3u^{10}+31u^{11}+48u^{12}+42u^{13}$ $(u^{24}+10u^{22}+\cdots-15u-4)$
c_8	u^3 $(-1+3u^2-5u^3-3u^4+10u^5+2u^6-18u^7+u^8+24u^9-7u^{10}-23u^{11}+10u^{12}+18u^{13}-$ $(u^{24}+3u^{23}+\cdots+224u+128)$
c_9	(u^3+u^2-1) $(-1-4u-5u^2-9u^3-11u^4+30u^5+36u^6-72u^7-65u^8+82u^9+57u^{10}-47u^{11}-16u^{12}$ $(u^{24}-6u^{22}+\cdots+1079u-676)$
c_{10}	(u^3-u^2+2u-1) $(-1+2u+u^2+u^3+9u^4-4u^5-2u^6-10u^7-25u^8+2u^9-3u^{10}+31u^{11}+48u^{12}+42u^{13}$ $(u^{24}+10u^{22}+\cdots-15u-4)$

V. Riley Polynomials

Crossings	Riley Polynomials at each crossings
c_1	$(64y^3-16y^2+8y-1)(64y^{24}-656y^{23}+\cdots-7y+1)$ $(y^{40}-21y^{39}+\cdots-1779930398y+170276399)$
c_2, c_5	$(y-1)^3(y^{24}+13y^{23}+\cdots-38y+1)(y^{40}+27y^{39}+\cdots+40y^2+1)$
c_3	$(y-1)^3(y^{24}+13y^{23}+\cdots-38y+1)(y^{40}+27y^{39}+\cdots+40y^2+1)$
c_4	$(64y^3-16y^2+8y-1)(64y^{24}-656y^{23}+\cdots-7y+1)$ $(y^{40}-21y^{39}+\cdots-1779930400y+170276401)$
c_6, c_7, c_{10}	(y^3+3y^2+2y-1) $(1-6y-21y^2+37y^3+175y^4-84y^5-756y^6-292y^7+1655y^8+1954y^9-1117y^{10}-3803$ $(y^{24}+20y^{23}+\cdots-97y+16)$
c_8	y^3 $(1-6y+15y^2-47y^3+119y^4-272y^5+536y^6-908y^7+1343y^8-1730y^9+1959y^{10}-195$ $(y^{24}-7y^{23}+\cdots-226304y+16384)$
c_9	$(y^3-y^2+2y-1)(y^{24}-12y^{23}+\cdots-1380561y+456976)$ $(y^{40}-22y^{39}+\cdots-12y+1)$
c_{11}	$(y-1)^3(y^{24}+13y^{23}+\cdots-38y+1)(y^{40}+27y^{39}+\cdots+40y^2+1)$