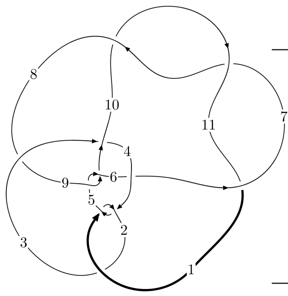
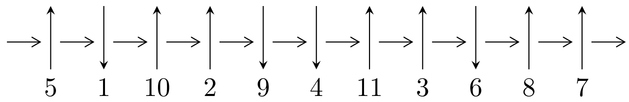
$11a_{67}$ ($K11a_{67}$)



A knot diagram[1]

Linearized knot diagam



Solving Sequence

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

Ideals for irreducible components[2] of $X_{\mathbf{par}}$

$$\begin{aligned}
I_1^u = \langle & 7.57965\times 10^{100}u^{65} + 1.68003\times 10^{101}u^{64} + \cdots + 6.92347\times 10^{99}b + 9.20330\times 10^{100}, \\
& -2.47059\times 10^{101}u^{65} - 5.69947\times 10^{101}u^{64} + \cdots + 2.07704\times 10^{100}a - 3.70163\times 10^{101}, \\
& u^{66} + 3u^{65} + \cdots + 3u + 1\rangle \\
I_2^u = \langle & b + u - 1,\ 3a + 2u + 2,\ u^2 - u + 1\rangle \\
I_3^u = \langle & b - u,\ 3a - u + 2,\ u^2 - u + 1\rangle
\end{aligned}$$

* 3 irreducible components of $\dim_{\mathbb{C}} = 0$, with total 70 representations.

---

[1] The image of knot diagram is generated by the software "**Draw programme**" developed by Andrew Bartholomew(`http://www.layer8.co.uk/maths/draw/index.htm#Running-draw`), where we modified some parts for our purpose(`https://github.com/CATsTAILs/LinksPainter`).

[2] All coefficients of polynomials are rational numbers. But the coefficients are sometimes approximated in decimal forms when there is not enough margin.

I. $I^u_1 = \langle 7.58\times10^{100}u^{65} + 1.68\times10^{101}u^{64} + \cdots + 6.92\times10^{99}b + 9.20\times10^{100},\ -2.47\times10^{101}u^{65} - 5.70\times10^{101}u^{64} + \cdots + 2.08\times10^{100}a - 3.70\times10^{101},\ u^{66} + 3u^{65} + \cdots + 3u + 1\rangle$

(i) Arc colorings

$$a_5 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$

$$a_9 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$

$$a_6 = \begin{pmatrix} 1 \\ u^2 \end{pmatrix}$$

$$a_2 = \begin{pmatrix} 11.8948u^{65} + 27.4403u^{64} + \cdots + 27.6224u + 17.8216 \\ -10.9478u^{65} - 24.2657u^{64} + \cdots - 22.9293u - 13.2929 \end{pmatrix}$$

$$a_{10} = \begin{pmatrix} -u \\ -u^3 + u \end{pmatrix}$$

$$a_1 = \begin{pmatrix} 22.8425u^{65} + 51.7060u^{64} + \cdots + 50.5518u + 31.1145 \\ -10.9478u^{65} - 24.2657u^{64} + \cdots - 22.9293u - 13.2929 \end{pmatrix}$$

$$a_3 = \begin{pmatrix} 6.57681u^{65} + 15.6596u^{64} + \cdots + 17.0862u + 11.0579 \\ -12.8649u^{65} - 27.9088u^{64} + \cdots - 26.2360u - 15.7081 \end{pmatrix}$$

$$a_4 = \begin{pmatrix} 0.307059u^{65} + 1.87504u^{64} + \cdots + 3.31189u + 3.66520 \\ -10.3782u^{65} - 22.8004u^{64} + \cdots - 21.2660u - 13.3401 \end{pmatrix}$$

$$a_7 = \begin{pmatrix} -11.0251u^{65} - 25.7638u^{64} + \cdots - 23.1138u - 17.5999 \\ 15.7432u^{65} + 36.3559u^{64} + \cdots + 35.5916u + 21.6869 \end{pmatrix}$$

$$a_8 = \begin{pmatrix} 9.82325u^{65} + 23.5692u^{64} + \cdots + 22.4882u + 14.6165 \\ -11.2402u^{65} - 24.5385u^{64} + \cdots - 20.0450u - 13.5642 \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} 7.80521u^{65} + 17.4313u^{64} + \cdots + 12.8222u + 10.6919 \\ -9.15300u^{65} - 20.5993u^{64} + \cdots - 19.6263u - 11.6363 \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} 7.80521u^{65} + 17.4313u^{64} + \cdots + 12.8222u + 10.6919 \\ -9.15300u^{65} - 20.5993u^{64} + \cdots - 19.6263u - 11.6363 \end{pmatrix}$$

(ii) Obstruction class $= -1$

(iii) Cusp Shapes $= 47.6455u^{65} + 100.101u^{64} + \cdots + 103.221u + 52.0421$

(iv) u-Polynomials at the component

Crossings	u-Polynomials at each crossing
c_1, c_4	$u^{66} + 3u^{65} + \cdots + 41u + 9$
c_2	$u^{66} + 31u^{65} + \cdots + 677u + 81$
c_3	$u^{66} - 3u^{65} + \cdots + 720u + 432$
c_5, c_9	$u^{66} + 3u^{65} + \cdots + 3u + 1$
c_6	$9(9u^{66} - 6u^{65} + \cdots - 14606u + 2729)$
c_7, c_{10}, c_{11}	$u^{66} + 3u^{65} + \cdots + 3u + 1$
c_8	$9(9u^{66} - 39u^{65} + \cdots + 10089u + 1177)$

(v) Riley Polynomials at the component

Crossings	Riley Polynomials at each crossing
c_1, c_4	$y^{66} + 31y^{65} + \cdots + 677y + 81$
c_2	$y^{66} + 11y^{65} + \cdots - 42151y + 6561$
c_3	$y^{66} + 25y^{65} + \cdots + 1835136y + 186624$
c_5, c_9	$y^{66} - 37y^{65} + \cdots - 7y + 1$
c_6	$81(81y^{66} - 1368y^{65} + \cdots + 2.20603 \times 10^8 y + 7447441)$
c_7, c_{10}, c_{11}	$y^{66} + 63y^{65} + \cdots - 7y + 1$
c_8	$81(81y^{66} + 2655y^{65} + \cdots - 3529607y + 1385329)$

(vi) Complex Volumes and Cusp Shapes

Solutions to I_1^u	$\sqrt{-1}(\text{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-1.027910+0.140250I$ $a=-1.56997+3.07061I$ $b=\ \ 0.494896+0.961583I$	$-1.87964+2.60684I$	0
$u=-1.027910-0.140250I$ $a=-1.56997-3.07061I$ $b=\ \ 0.494896-0.961583I$	$-1.87964-2.60684I$	0
$u=\ \ 0.267669+0.912838I$ $a=\ \ 0.795579+0.323644I$ $b=-0.587688+0.502670I$	$1.99050+1.28842I$	$6.23643-3.32220I$
$u=\ \ 0.267669-0.912838I$ $a=\ \ 0.795579-0.323644I$ $b=-0.587688-0.502670I$	$1.99050-1.28842I$	$6.23643+3.32220I$
$u=\ \ 0.929271+0.179840I$ $a=\ \ 3.08538-1.09458I$ $b=\ \ 0.381546+0.907422I$	$-7.08795+1.79943I$	$3.00000+0.I$
$u=\ \ 0.929271-0.179840I$ $a=\ \ 3.08538+1.09458I$ $b=\ \ 0.381546-0.907422I$	$-7.08795-1.79943I$	$3.00000+0.I$
$u=\ \ 1.027420+0.259721I$ $a=-0.63107-2.20262I$ $b=\ \ 0.578870-1.167110I$	$-1.62753-4.82509I$	0
$u=\ \ 1.027420-0.259721I$ $a=-0.63107+2.20262I$ $b=\ \ 0.578870+1.167110I$	$-1.62753+4.82509I$	0
$u=-0.126987+0.929394I$ $a=\ \ 0.648741-0.233480I$ $b=-0.807014-0.382013I$	$-3.85129-4.96920I$	$3.00000+2.88447I$
$u=-0.126987-0.929394I$ $a=\ \ 0.648741+0.233480I$ $b=-0.807014+0.382013I$	$-3.85129+4.96920I$	$3.00000-2.88447I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol} + \sqrt{-1}CS)$	Cusp shape
$u = -0.878518 + 0.301881I$ $a = -0.17890 + 1.44186I$ $b = 0.925761 + 0.963630I$	$-3.68434 + 4.73747I$	$1.30727 - 7.90880I$
$u = -0.878518 - 0.301881I$ $a = -0.17890 - 1.44186I$ $b = 0.925761 - 0.963630I$	$-3.68434 - 4.73747I$	$1.30727 + 7.90880I$
$u = -0.093833 + 1.098820I$ $a = 0.625616 + 0.592154I$ $b = -0.595202 + 1.124180I$	$-6.06522 - 10.21100I$	0
$u = -0.093833 - 1.098820I$ $a = 0.625616 - 0.592154I$ $b = -0.595202 - 1.124180I$	$-6.06522 + 10.21100I$	0
$u = -1.063900 + 0.314595I$ $a = -0.42713 + 2.25061I$ $b = 0.54028 + 1.34674I$	$-7.07880 + 6.83377I$	0
$u = -1.063900 - 0.314595I$ $a = -0.42713 - 2.25061I$ $b = 0.54028 - 1.34674I$	$-7.07880 - 6.83377I$	0
$u = 1.142820 + 0.051839I$ $a = 1.52539 - 3.45312I$ $b = 0.364468 - 0.789088I$	$-6.72143 - 1.46998I$	0
$u = 1.142820 - 0.051839I$ $a = 1.52539 + 3.45312I$ $b = 0.364468 + 0.789088I$	$-6.72143 + 1.46998I$	0
$u = 0.263475 + 0.806064I$ $a = 0.756962 - 0.438726I$ $b = -0.155427 - 1.130610I$	$-8.91388 - 2.47472I$	$-3.77224 + 2.13911I$
$u = 0.263475 - 0.806064I$ $a = 0.756962 + 0.438726I$ $b = -0.155427 + 1.130610I$	$-8.91388 + 2.47472I$	$-3.77224 - 2.13911I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.804342 + 0.238052I$ $a = -0.138734 - 0.766058I$ $b = 0.811477 - 0.733493I$	$0.71398 - 2.89026I$	$7.98157 + 7.76196I$
$u = 0.804342 - 0.238052I$ $a = -0.138734 + 0.766058I$ $b = 0.811477 + 0.733493I$	$0.71398 + 2.89026I$	$7.98157 - 7.76196I$
$u = -0.667684 + 0.979193I$ $a = 0.993850 - 0.593955I$ $b = -0.401394 - 0.744321I$	$0.01721 + 3.43805I$	0
$u = -0.667684 - 0.979193I$ $a = 0.993850 + 0.593955I$ $b = -0.401394 + 0.744321I$	$0.01721 - 3.43805I$	0
$u = 0.158730 + 1.178700I$ $a = 0.617050 - 0.572268I$ $b = -0.537011 - 1.034030I$	$0.42286 + 5.79491I$	0
$u = 0.158730 - 1.178700I$ $a = 0.617050 + 0.572268I$ $b = -0.537011 + 1.034030I$	$0.42286 - 5.79491I$	0
$u = -0.420402 + 1.160070I$ $a = 0.577230 + 0.519941I$ $b = -0.417197 + 0.960057I$	$-0.683814 - 0.021668I$	0
$u = -0.420402 - 1.160070I$ $a = 0.577230 - 0.519941I$ $b = -0.417197 - 0.960057I$	$-0.683814 + 0.021668I$	0
$u = -1.148800 + 0.518145I$ $a = 0.060373 - 0.165749I$ $b = -0.626248 + 0.346796I$	$-1.69354 + 2.00274I$	0
$u = -1.148800 - 0.518145I$ $a = 0.060373 + 0.165749I$ $b = -0.626248 - 0.346796I$	$-1.69354 - 2.00274I$	0

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = -0.668822 + 0.298999I$ $a = 0.694866 + 0.620371I$ $b = 0.935300 + 0.273219I$	$-2.35847 + 1.56855I$	$4.39447 - 3.89698I$
$u = -0.668822 - 0.298999I$ $a = 0.694866 - 0.620371I$ $b = 0.935300 - 0.273219I$	$-2.35847 - 1.56855I$	$4.39447 + 3.89698I$
$u = -0.720655 + 0.061865I$ $a = 0.825120 + 0.868088I$ $b = 0.437299 - 0.709945I$	$-1.03551 - 1.38591I$	$-5.22665 + 5.92733I$
$u = -0.720655 - 0.061865I$ $a = 0.825120 - 0.868088I$ $b = 0.437299 + 0.709945I$	$-1.03551 + 1.38591I$	$-5.22665 - 5.92733I$
$u = 1.232360 + 0.377220I$ $a = 0.208644 + 0.679292I$ $b = -0.625470 + 0.073721I$	$-8.25951 + 0.62444I$	0
$u = 1.232360 - 0.377220I$ $a = 0.208644 - 0.679292I$ $b = -0.625470 - 0.073721I$	$-8.25951 - 0.62444I$	0
$u = -0.596410 + 0.337532I$ $a = 0.681963 + 0.070596I$ $b = 0.159471 + 0.573771I$	$-1.16566 + 1.36283I$	$-2.49105 - 4.63362I$
$u = -0.596410 - 0.337532I$ $a = 0.681963 - 0.070596I$ $b = 0.159471 - 0.573771I$	$-1.16566 - 1.36283I$	$-2.49105 + 4.63362I$
$u = -1.274710 + 0.356952I$ $a = -0.38689 + 1.90829I$ $b = -0.144965 + 1.388670I$	$-13.4953 + 6.4032I$	0
$u = -1.274710 - 0.356952I$ $a = -0.38689 - 1.90829I$ $b = -0.144965 - 1.388670I$	$-13.4953 - 6.4032I$	0

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 1.300980 + 0.293047I$ $a = -0.15525 - 1.89069I$ $b = -0.112571 - 1.208740I$	$-6.61424 - 3.82375I$	0
$u = 1.300980 - 0.293047I$ $a = -0.15525 + 1.89069I$ $b = -0.112571 + 1.208740I$	$-6.61424 + 3.82375I$	0
$u = 1.231140 + 0.533142I$ $a = -0.250791 + 0.196456I$ $b = -0.854961 - 0.385031I$	$-1.08969 - 6.56887I$	0
$u = 1.231140 - 0.533142I$ $a = -0.250791 - 0.196456I$ $b = -0.854961 + 0.385031I$	$-1.08969 + 6.56887I$	0
$u = -1.259040 + 0.522644I$ $a = -0.402514 - 0.295163I$ $b = -0.982154 + 0.351456I$	$-7.34078 + 10.21730I$	0
$u = -1.259040 - 0.522644I$ $a = -0.402514 + 0.295163I$ $b = -0.982154 - 0.351456I$	$-7.34078 - 10.21730I$	0
$u = 1.209140 + 0.641703I$ $a = 1.30879 + 1.40280I$ $b = -0.403574 + 1.119680I$	$-11.48110 - 3.00110I$	0
$u = 1.209140 - 0.641703I$ $a = 1.30879 - 1.40280I$ $b = -0.403574 - 1.119680I$	$-11.48110 + 3.00110I$	0
$u = 0.553080 + 0.247800I$ $a = 0.972098 - 0.300416I$ $b = 0.633036 + 0.187323I$	$1.191740 + 0.072864I$	$10.27225 + 0.64255I$
$u = 0.553080 - 0.247800I$ $a = 0.972098 + 0.300416I$ $b = 0.633036 - 0.187323I$	$1.191740 - 0.072864I$	$10.27225 - 0.64255I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol} + \sqrt{-1}CS)$	Cusp shape
$u = -1.32753 + 0.56696I$ $a = 0.97157 - 1.80452I$ $b = -0.644585 - 1.195850I$	$-9.9328 + 16.0998I$	0
$u = -1.32753 - 0.56696I$ $a = 0.97157 + 1.80452I$ $b = -0.644585 + 1.195850I$	$-9.9328 - 16.0998I$	0
$u = 1.33445 + 0.59375I$ $a = 0.95771 + 1.67943I$ $b = -0.613804 + 1.137650I$	$-3.35255 - 12.00270I$	0
$u = 1.33445 - 0.59375I$ $a = 0.95771 - 1.67943I$ $b = -0.613804 - 1.137650I$	$-3.35255 + 12.00270I$	0
$u = -1.43305 + 0.29093I$ $a = -0.02130 + 1.54098I$ $b = -0.300452 + 1.063620I$	$-5.41831 - 0.47417I$	0
$u = -1.43305 - 0.29093I$ $a = -0.02130 - 1.54098I$ $b = -0.300452 - 1.063620I$	$-5.41831 + 0.47417I$	0
$u = -1.31812 + 0.64627I$ $a = 1.01971 - 1.51040I$ $b = -0.539949 - 1.088430I$	$-3.79681 + 6.60858I$	0
$u = -1.31812 - 0.64627I$ $a = 1.01971 + 1.51040I$ $b = -0.539949 + 1.088430I$	$-3.79681 - 6.60858I$	0
$u = -0.429696 + 0.307998I$ $a = 1.167160 + 0.258396I$ $b = 0.850565 - 0.604928I$	$-2.64330 - 1.72779I$	$3.37557 + 1.36335I$
$u = -0.429696 - 0.307998I$ $a = 1.167160 - 0.258396I$ $b = 0.850565 + 0.604928I$	$-2.64330 + 1.72779I$	$3.37557 - 1.36335I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 1.44535 + 0.41062I$ $a = -0.231500 - 1.341830I$ $b = -0.455012 - 1.123040I$	$-11.13050 + 4.68214I$	0
$u = 1.44535 - 0.41062I$ $a = -0.231500 + 1.341830I$ $b = -0.455012 + 1.123040I$	$-11.13050 - 4.68214I$	0
$u = -0.104871 + 0.408761I$ $a = 1.153220 - 0.114537I$ $b = 0.597692 - 1.092470I$	$-4.56797 - 3.83881I$	$1.28636 + 2.41019I$
$u = -0.104871 - 0.408761I$ $a = 1.153220 + 0.114537I$ $b = 0.597692 + 1.092470I$	$-4.56797 + 3.83881I$	$1.28636 - 2.41019I$
$u = 0.160720 + 0.228423I$ $a = 1.080360 - 0.013737I$ $b = 0.594015 + 0.896392I$	$0.45918 + 2.40111I$	$3.44791 - 1.32342I$
$u = 0.160720 - 0.228423I$ $a = 1.080360 + 0.013737I$ $b = 0.594015 - 0.896392I$	$0.45918 - 2.40111I$	$3.44791 + 1.32342I$

II. $I_2^u = \langle b + u - 1,\ 3a + 2u + 2,\ u^2 - u + 1\rangle$

(i) Arc colorings

$$a_5 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$
$$a_9 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$
$$a_6 = \begin{pmatrix} 1 \\ u - 1 \end{pmatrix}$$
$$a_2 = \begin{pmatrix} -\frac{2}{3}u - \frac{2}{3} \\ -u + 1 \end{pmatrix}$$
$$a_{10} = \begin{pmatrix} -u \\ u + 1 \end{pmatrix}$$
$$a_1 = \begin{pmatrix} \frac{1}{3}u - \frac{5}{3} \\ -u + 1 \end{pmatrix}$$
$$a_3 = \begin{pmatrix} \frac{2}{3}u - \frac{1}{3} \\ -u \end{pmatrix}$$
$$a_4 = \begin{pmatrix} \frac{2}{3}u - \frac{1}{3} \\ -u \end{pmatrix}$$
$$a_7 = \begin{pmatrix} 1.33333 \\ \frac{4}{3}u - \frac{5}{3} \end{pmatrix}$$
$$a_8 = \begin{pmatrix} \frac{1}{3}u \\ \frac{2}{3}u - \frac{1}{3} \end{pmatrix}$$
$$a_{11} = \begin{pmatrix} -u - \frac{1}{3} \\ \frac{2}{3}u + \frac{2}{3} \end{pmatrix}$$
$$a_{11} = \begin{pmatrix} -u - \frac{1}{3} \\ \frac{2}{3}u + \frac{2}{3} \end{pmatrix}$$

(ii) Obstruction class $= 1$

(iii) Cusp Shapes $= \frac{32}{3}u - 5$

(iv) u-Polynomials at the component

Crossings	u-Polynomials at each crossing
c_1, c_2, c_7 c_9	$u^2 + u + 1$
c_3	u^2
c_4, c_5, c_{10} c_{11}	$u^2 - u + 1$
c_6	$3(3u^2 + 1)$
c_8	$3(3u^2 - 3u + 1)$

(v) Riley Polynomials at the component

Crossings	Riley Polynomials at each crossing
c_1, c_2, c_4 c_5, c_7, c_9 c_{10}, c_{11}	$y^2 + y + 1$
c_3	y^2
c_6	$9(3y + 1)^2$
c_8	$9(9y^2 - 3y + 1)$

(vi) Complex Volumes and Cusp Shapes

Solutions to I_2^u	$\sqrt{-1}(\mathrm{vol} + \sqrt{-1}CS)$	Cusp shape
$u = \quad 0.500000 + 0.866025I$ $a = -1.000000 - 0.577350I$ $b = \quad 0.500000 - 0.866025I$	$-\,4.05977I$	$0.33333 + 9.23760I$
$u = \quad 0.500000 - 0.866025I$ $a = -1.000000 + 0.577350I$ $b = \quad 0.500000 + 0.866025I$	$4.05977I$	$0.33333 - 9.23760I$

III. $\boldsymbol{I_3^u = \langle b - u,\ 3a - u + 2,\ u^2 - u + 1\rangle}$

(i) Arc colorings

$$a_5 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$

$$a_9 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$

$$a_6 = \begin{pmatrix} 1 \\ u - 1 \end{pmatrix}$$

$$a_2 = \begin{pmatrix} \frac{1}{3}u - \frac{2}{3} \\ u \end{pmatrix}$$

$$a_{10} = \begin{pmatrix} -u \\ u + 1 \end{pmatrix}$$

$$a_1 = \begin{pmatrix} -\frac{2}{3}u - \frac{2}{3} \\ u \end{pmatrix}$$

$$a_3 = \begin{pmatrix} -\frac{1}{3}u + \frac{2}{3} \\ u - 1 \end{pmatrix}$$

$$a_4 = \begin{pmatrix} -\frac{1}{3}u + \frac{2}{3} \\ u - 1 \end{pmatrix}$$

$$a_7 = \begin{pmatrix} \frac{1}{3}u + \frac{2}{3} \\ \frac{1}{3}u - \frac{2}{3} \end{pmatrix}$$

$$a_8 = \begin{pmatrix} -0.333333 \\ \frac{2}{3}u + \frac{2}{3} \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} -\frac{4}{3}u + \frac{1}{3} \\ \frac{5}{3}u - \frac{1}{3} \end{pmatrix}$$

$$a_{11} = \begin{pmatrix} -\frac{4}{3}u + \frac{1}{3} \\ \frac{5}{3}u - \frac{1}{3} \end{pmatrix}$$

(ii) Obstruction class $= 1$

(iii) Cusp Shapes $= 5.33333$

(iv) u-Polynomials at the component

Crossings	u-Polynomials at each crossing
c_1, c_2, c_7 c_9	$u^2 + u + 1$
c_3	u^2
c_4, c_5, c_{10} c_{11}	$u^2 - u + 1$
c_6, c_8	$3(3u^2 + 3u + 1)$

(v) Riley Polynomials at the component

Crossings	Riley Polynomials at each crossing
c_1, c_2, c_4 c_5, c_7, c_9 c_{10}, c_{11}	$y^2 + y + 1$
c_3	y^2
c_6, c_8	$9(9y^2 - 3y + 1)$

(vi) Complex Volumes and Cusp Shapes

Solutions to I_3^u	$\sqrt{-1}(\text{vol} + \sqrt{-1}CS)$	Cusp shape
$u = \quad 0.500000 + 0.866025I$ $a = -0.500000 + 0.288675I$ $b = \quad 0.500000 + 0.866025I$	0	5.33330
$u = \quad 0.500000 - 0.866025I$ $a = -0.500000 - 0.288675I$ $b = \quad 0.500000 - 0.866025I$	0	5.33330

IV. u-Polynomials

Crossings	u-Polynomials at each crossing
c_1	$((u^2+u+1)^2)(u^{66}+3u^{65}+\cdots+41u+9)$
c_2	$((u^2+u+1)^2)(u^{66}+31u^{65}+\cdots+677u+81)$
c_3	$u^4(u^{66}-3u^{65}+\cdots+720u+432)$
c_4	$((u^2-u+1)^2)(u^{66}+3u^{65}+\cdots+41u+9)$
c_5	$((u^2-u+1)^2)(u^{66}+3u^{65}+\cdots+3u+1)$
c_6	$81(3u^2+1)(3u^2+3u+1)(9u^{66}-6u^{65}+\cdots-14606u+2729)$
c_7	$((u^2+u+1)^2)(u^{66}+3u^{65}+\cdots+3u+1)$
c_8	$81(3u^2-3u+1)(3u^2+3u+1)(9u^{66}-39u^{65}+\cdots+10089u+1177)$
c_9	$((u^2+u+1)^2)(u^{66}+3u^{65}+\cdots+3u+1)$
c_{10},c_{11}	$((u^2-u+1)^2)(u^{66}+3u^{65}+\cdots+3u+1)$

V. Riley Polynomials

Crossings	Riley Polynomials at each crossing
c_1, c_4	$((y^2+y+1)^2)(y^{66}+31y^{65}+\cdots+677y+81)$
c_2	$((y^2+y+1)^2)(y^{66}+11y^{65}+\cdots-42151y+6561)$
c_3	$y^4(y^{66}+25y^{65}+\cdots+1835136y+186624)$
c_5, c_9	$((y^2+y+1)^2)(y^{66}-37y^{65}+\cdots-7y+1)$
c_6	$6561(3y+1)^2(9y^2-3y+1)$ $\cdot(81y^{66}-1368y^{65}+\cdots+220603054y+7447441)$
c_7, c_{10}, c_{11}	$((y^2+y+1)^2)(y^{66}+63y^{65}+\cdots-7y+1)$
c_8	$6561(9y^2-3y+1)^2$ $\cdot(81y^{66}+2655y^{65}+\cdots-3529607y+1385329)$