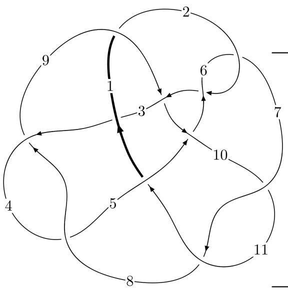
$11a_{328}$ ($K11a_{328}$)



A knot diagram[1]

Linearized knot diagam

$$\rightarrow \underset{9}{\downarrow} \rightarrow \underset{6}{\downarrow} \rightarrow \underset{1}{\downarrow} \rightarrow \underset{8}{\uparrow} \rightarrow \underset{10}{\downarrow} \rightarrow \underset{2}{\downarrow} \rightarrow \underset{11}{\downarrow} \rightarrow \underset{4}{\uparrow} \rightarrow \underset{3}{\downarrow} \rightarrow \underset{7}{\downarrow} \rightarrow \underset{5}{\downarrow} \rightarrow$$

Solving Sequence

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

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

$$\begin{aligned}
I_1^u = \langle & -2.23921 \times 10^{242} u^{86} - 7.92450 \times 10^{242} u^{85} + \cdots + 2.99360 \times 10^{243} b + 1.15001 \times 10^{243}, \\
& 2.69979 \times 10^{242} u^{86} + 1.06399 \times 10^{243} u^{85} + \cdots + 5.98721 \times 10^{243} a - 3.98514 \times 10^{244}, \\
& u^{87} + 4u^{86} + \cdots + 343u - 49 \rangle \\
I_2^u = \langle & 491u^{12} - 351u^{11} + \cdots + 2441b + 3926,\ 3175u^{12} + 6674u^{11} + \cdots + 4882a - 4765, \\
& u^{13} + u^{12} + 5u^{11} + 5u^{10} + 15u^9 + 6u^8 + 26u^7 - 3u^6 + 25u^5 - 10u^4 + 13u^3 - 5u^2 + 2u - 1 \rangle
\end{aligned}$$

* 2 irreducible components of $\dim_{\mathbb{C}} = 0$, with total 100 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. $\boldsymbol{I_1^u = \langle -2.24 \times 10^{242} u^{86} - 7.92 \times 10^{242} u^{85} + \cdots + 2.99 \times 10^{243} b + 1.15 \times 10^{243},\ 2.70 \times 10^{242} u^{86} + 1.06 \times 10^{243} u^{85} + \cdots + 5.99 \times 10^{243} a - 3.99 \times 10^{244},\ u^{87} + 4u^{86} + \cdots + 343u - 49 \rangle}$

(i) Arc colorings

$$a_5 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$
$$a_8 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$
$$a_4 = \begin{pmatrix} 1 \\ u^2 \end{pmatrix}$$
$$a_1 = \begin{pmatrix} -0.0450926u^{86} - 0.177711u^{85} + \cdots - 17.8452u + 6.65609 \\ 0.0747999u^{86} + 0.264715u^{85} + \cdots - 0.552281u - 0.384156 \end{pmatrix}$$
$$a_9 = \begin{pmatrix} u \\ u^3 + u \end{pmatrix}$$
$$a_2 = \begin{pmatrix} 0.0402372u^{86} + 0.122380u^{85} + \cdots - 33.7223u + 8.81924 \\ 0.0372983u^{86} + 0.116784u^{85} + \cdots + 1.89332u - 0.241227 \end{pmatrix}$$
$$a_3 = \begin{pmatrix} -0.0493242u^{86} - 0.246384u^{85} + \cdots - 11.7605u - 0.960720 \\ 0.0348186u^{86} + 0.139522u^{85} + \cdots - 21.6142u + 4.39832 \end{pmatrix}$$
$$a_{11} = \begin{pmatrix} 0.0297073u^{86} + 0.0870039u^{85} + \cdots - 18.3975u + 6.27193 \\ 0.0747999u^{86} + 0.264715u^{85} + \cdots - 0.552281u - 0.384156 \end{pmatrix}$$
$$a_7 = \begin{pmatrix} 0.0601123u^{86} + 0.192499u^{85} + \cdots - 42.5585u + 12.4589 \\ -0.0878581u^{86} - 0.355305u^{85} + \cdots + 15.9562u - 1.44904 \end{pmatrix}$$
$$a_6 = \begin{pmatrix} 0.0993724u^{86} + 0.357805u^{85} + \cdots - 25.6649u + 5.15445 \\ 0.0206546u^{86} + 0.131560u^{85} + \cdots + 0.640094u + 1.53755 \end{pmatrix}$$
$$a_{10} = \begin{pmatrix} -0.106056u^{86} - 0.436946u^{85} + \cdots + 36.4451u - 8.52379 \\ -0.0235474u^{86} - 0.0851142u^{85} + \cdots + 9.34856u - 2.37135 \end{pmatrix}$$
$$a_{10} = \begin{pmatrix} -0.106056u^{86} - 0.436946u^{85} + \cdots + 36.4451u - 8.52379 \\ -0.0235474u^{86} - 0.0851142u^{85} + \cdots + 9.34856u - 2.37135 \end{pmatrix}$$

(ii) Obstruction class $= -1$

(iii) Cusp Shapes $= 0.108591u^{86} + 0.627995u^{85} + \cdots - 113.643u + 28.5257$

(iv) u-Polynomials at the component

Crossings	u-Polynomials at each crossing
c_1	$u^{87} + 3u^{86} + \cdots - 5484u + 667$
c_2, c_6	$u^{87} + u^{86} + \cdots - 140u + 23$
c_3	$2(2u^{87} - 17u^{86} + \cdots - 8u + 1)$
c_4, c_8	$u^{87} - 4u^{86} + \cdots + 343u + 49$
c_5	$u^{87} - 3u^{86} + \cdots + 11633u + 2362$
c_7, c_{10}	$2(2u^{87} + 5u^{86} + \cdots + 9624u + 539)$
c_9	$2(2u^{87} - 5u^{86} + \cdots + 1311u + 349)$
c_{11}	$u^{87} + 2u^{86} + \cdots + 2885u + 538$

(v) Riley Polynomials at the component

Crossings	Riley Polynomials at each crossing
c_1	$y^{87} - 13y^{86} + \cdots + 17748096y - 444889$
c_2, c_6	$y^{87} + 45y^{86} + \cdots + 11504y - 529$
c_3	$4(4y^{87} - 13y^{86} + \cdots - 4y - 1)$
c_4, c_8	$y^{87} + 66y^{86} + \cdots + 43561y - 2401$
c_5	$y^{87} + 9y^{86} + \cdots - 55400087y - 5579044$
c_7, c_{10}	$4(4y^{87} - 285y^{86} + \cdots + 1.28127 \times 10^7 y - 290521)$
c_9	$4(4y^{87} + 103y^{86} + \cdots - 1.77548 \times 10^7 y - 121801)$
c_{11}	$y^{87} - 38y^{86} + \cdots + 7135321y - 289444$

(vi) Complex Volumes and Cusp Shapes

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = -0.776879 + 0.541054I$ $a = 0.188536 + 1.157520I$ $b = 1.026510 - 0.627724I$	$1.01962 + 3.49300I$	0
$u = -0.776879 - 0.541054I$ $a = 0.188536 - 1.157520I$ $b = 1.026510 + 0.627724I$	$1.01962 - 3.49300I$	0
$u = 1.007580 + 0.327641I$ $a = 0.183992 + 0.069606I$ $b = 0.789772 - 0.734118I$	$-1.60864 + 6.07731I$	0
$u = 1.007580 - 0.327641I$ $a = 0.183992 - 0.069606I$ $b = 0.789772 + 0.734118I$	$-1.60864 - 6.07731I$	0
$u = 0.245817 + 0.897592I$ $a = 1.80503 - 0.59455I$ $b = -0.938277 + 0.817700I$	$3.46748 + 3.58811I$	0
$u = 0.245817 - 0.897592I$ $a = 1.80503 + 0.59455I$ $b = -0.938277 - 0.817700I$	$3.46748 - 3.58811I$	0
$u = 0.908219 + 0.099499I$ $a = 0.364543 - 0.135798I$ $b = -0.390262 - 0.953575I$	$5.02660 - 6.57361I$	0
$u = 0.908219 - 0.099499I$ $a = 0.364543 + 0.135798I$ $b = -0.390262 + 0.953575I$	$5.02660 + 6.57361I$	0
$u = -0.374562 + 1.029910I$ $a = 1.97132 - 0.41269I$ $b = -2.04798 - 0.80570I$	$-0.50770 - 7.93768I$	0
$u = -0.374562 - 1.029910I$ $a = 1.97132 + 0.41269I$ $b = -2.04798 + 0.80570I$	$-0.50770 + 7.93768I$	0

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-0.217099+1.081390I$ $a=-1.90936+0.88490I$ $b=\ \ 0.529903+0.247555I$	$-0.703925-0.037215I$	0
$u=-0.217099-1.081390I$ $a=-1.90936-0.88490I$ $b=\ \ 0.529903-0.247555I$	$-0.703925+0.037215I$	0
$u=-0.220013+1.097370I$ $a=-0.953091-0.049330I$ $b=\ \ 0.613788+0.509488I$	$-0.94053-1.58665I$	0
$u=-0.220013-1.097370I$ $a=-0.953091+0.049330I$ $b=\ \ 0.613788-0.509488I$	$-0.94053+1.58665I$	0
$u=-0.027487+1.147150I$ $a=-0.068691-0.603804I$ $b=\ \ 0.109168-1.084490I$	$-2.95518-0.92414I$	0
$u=-0.027487-1.147150I$ $a=-0.068691+0.603804I$ $b=\ \ 0.109168+1.084490I$	$-2.95518+0.92414I$	0
$u=-0.834059+0.034209I$ $a=-0.225565-0.290060I$ $b=-0.822239+0.737364I$	$3.93560+2.19338I$	$-1.92699-3.84180I$
$u=-0.834059-0.034209I$ $a=-0.225565+0.290060I$ $b=-0.822239-0.737364I$	$3.93560-2.19338I$	$-1.92699+3.84180I$
$u=\ \ 0.202235+1.161160I$ $a=-1.79634+0.72293I$ $b=\ \ 0.802586-0.468686I$	$2.03222+0.78901I$	0
$u=\ \ 0.202235-1.161160I$ $a=-1.79634-0.72293I$ $b=\ \ 0.802586+0.468686I$	$2.03222-0.78901I$	0

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.012862 + 1.192010I$ $a = -1.90807 - 0.84701I$ $b = 1.94746 + 1.83329I$	$-3.17906 + 6.66017I$	0
$u = 0.012862 - 1.192010I$ $a = -1.90807 + 0.84701I$ $b = 1.94746 - 1.83329I$	$-3.17906 - 6.66017I$	0
$u = 0.235984 + 1.200170I$ $a = 1.48127 + 0.13165I$ $b = -0.951440 - 0.148069I$	$-4.06130 + 2.44977I$	0
$u = 0.235984 - 1.200170I$ $a = 1.48127 - 0.13165I$ $b = -0.951440 + 0.148069I$	$-4.06130 - 2.44977I$	0
$u = 0.761682 + 0.143291I$ $a = -0.976859 + 0.023521I$ $b = -0.563074 + 0.406965I$	$-1.92081 + 0.61884I$	$-7.87734 - 1.96780I$
$u = 0.761682 - 0.143291I$ $a = -0.976859 - 0.023521I$ $b = -0.563074 - 0.406965I$	$-1.92081 - 0.61884I$	$-7.87734 + 1.96780I$
$u = 0.112847 + 1.223690I$ $a = 2.47523 - 0.15334I$ $b = -2.44222 + 1.06035I$	$-7.01048 + 0.84605I$	0
$u = 0.112847 - 1.223690I$ $a = 2.47523 + 0.15334I$ $b = -2.44222 - 1.06035I$	$-7.01048 - 0.84605I$	0
$u = -0.755476 + 0.104993I$ $a = -0.419450 - 0.027979I$ $b = 0.223634 + 0.914975I$	$1.83703 - 2.21620I$	$-3.51529 + 3.55324I$
$u = -0.755476 - 0.104993I$ $a = -0.419450 + 0.027979I$ $b = 0.223634 - 0.914975I$	$1.83703 + 2.21620I$	$-3.51529 - 3.55324I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-1.210730+0.265007I$ $a=-0.113980+0.093687I$ $b=-0.811339-0.684971I$	$1.28183-11.73510I$	0
$u=-1.210730-0.265007I$ $a=-0.113980-0.093687I$ $b=-0.811339+0.684971I$	$1.28183+11.73510I$	0
$u=-0.370860+1.187910I$ $a=-1.44787+0.53047I$ $b=\ \ 1.49725-0.21594I$	$-0.72894-6.29842I$	0
$u=-0.370860-1.187910I$ $a=-1.44787-0.53047I$ $b=\ \ 1.49725+0.21594I$	$-0.72894+6.29842I$	0
$u=\ \ 0.082178+1.267230I$ $a=\ \ 1.81882+0.60579I$ $b=-1.43238+0.41505I$	$-7.65344+1.93513I$	0
$u=\ \ 0.082178-1.267230I$ $a=\ \ 1.81882-0.60579I$ $b=-1.43238-0.41505I$	$-7.65344-1.93513I$	0
$u=\ \ 0.154767+1.267260I$ $a=-1.123800+0.806234I$ $b=\ \ 1.16362-1.85704I$	$-6.42084+3.25398I$	0
$u=\ \ 0.154767-1.267260I$ $a=-1.123800-0.806234I$ $b=\ \ 1.16362+1.85704I$	$-6.42084-3.25398I$	0
$u=\ \ 0.315271+0.626744I$ $a=\ \ 0.014758-0.894661I$ $b=\ \ 0.34862+1.39642I$	$4.42600-0.87222I$	$-1.33257-4.60840I$
$u=\ \ 0.315271-0.626744I$ $a=\ \ 0.014758+0.894661I$ $b=\ \ 0.34862-1.39642I$	$4.42600+0.87222I$	$-1.33257+4.60840I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol} + \sqrt{-1}CS)$	Cusp shape
$u = -0.138100 + 1.293420I$ $a = -1.55432 + 0.54367I$ $b = 1.168620 + 0.682207I$	$-4.91824 - 8.48201I$	0
$u = -0.138100 - 1.293420I$ $a = -1.55432 - 0.54367I$ $b = 1.168620 - 0.682207I$	$-4.91824 + 8.48201I$	0
$u = 0.428306 + 1.245240I$ $a = -1.62246 + 0.15416I$ $b = 0.755026 - 0.694879I$	$1.44453 + 11.33890I$	0
$u = 0.428306 - 1.245240I$ $a = -1.62246 - 0.15416I$ $b = 0.755026 + 0.694879I$	$1.44453 - 11.33890I$	0
$u = 0.181300 + 1.304480I$ $a = -0.363009 - 0.100801I$ $b = 0.459339 - 0.988301I$	$-6.35047 + 2.80896I$	0
$u = 0.181300 - 1.304480I$ $a = -0.363009 + 0.100801I$ $b = 0.459339 + 0.988301I$	$-6.35047 - 2.80896I$	0
$u = -0.388024 + 1.265100I$ $a = -1.80417 + 0.04080I$ $b = 1.63904 + 0.82465I$	$0.10297 - 6.59252I$	0
$u = -0.388024 - 1.265100I$ $a = -1.80417 - 0.04080I$ $b = 1.63904 - 0.82465I$	$0.10297 + 6.59252I$	0
$u = -0.328530 + 1.294480I$ $a = 1.49353 + 0.38820I$ $b = -0.815892 - 0.631455I$	$-2.48697 - 6.11850I$	0
$u = -0.328530 - 1.294480I$ $a = 1.49353 - 0.38820I$ $b = -0.815892 + 0.631455I$	$-2.48697 + 6.11850I$	0

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol} + \sqrt{-1}CS)$	Cusp shape
$u = 0.012517 + 1.341530I$ $a = 0.877313 - 0.120821I$ $b = -0.758450 - 0.797102I$	$-6.25662 + 2.11272I$	0
$u = 0.012517 - 1.341530I$ $a = 0.877313 + 0.120821I$ $b = -0.758450 + 0.797102I$	$-6.25662 - 2.11272I$	0
$u = 1.354960 + 0.065636I$ $a = -0.249415 - 0.140378I$ $b = -0.659999 + 0.151798I$	$-2.16816 + 0.86837I$	0
$u = 1.354960 - 0.065636I$ $a = -0.249415 + 0.140378I$ $b = -0.659999 - 0.151798I$	$-2.16816 - 0.86837I$	0
$u = 0.100175 + 0.612166I$ $a = 0.37206 + 2.60657I$ $b = -0.273208 + 0.157111I$	$-1.084890 + 0.871384I$	$-15.6106 - 3.4978I$
$u = 0.100175 - 0.612166I$ $a = 0.37206 - 2.60657I$ $b = -0.273208 - 0.157111I$	$-1.084890 - 0.871384I$	$-15.6106 + 3.4978I$
$u = -0.67656 + 1.24255I$ $a = 0.0242517 - 0.0831628I$ $b = 0.012280 + 0.372469I$	$-0.78893 - 2.23324I$	0
$u = -0.67656 - 1.24255I$ $a = 0.0242517 + 0.0831628I$ $b = 0.012280 - 0.372469I$	$-0.78893 + 2.23324I$	0
$u = -0.543318 + 0.090886I$ $a = 0.411855 - 1.155200I$ $b = -0.757344 - 0.051881I$	$2.36842 + 2.62824I$	$-3.63497 - 2.44788I$
$u = -0.543318 - 0.090886I$ $a = 0.411855 + 1.155200I$ $b = -0.757344 + 0.051881I$	$2.36842 - 2.62824I$	$-3.63497 + 2.44788I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.42905 + 1.44683I$ $a = 1.54404 - 0.21136I$ $b = -1.51558 + 1.17301I$	$-7.14017 + 11.20710I$	0
$u = 0.42905 - 1.44683I$ $a = 1.54404 + 0.21136I$ $b = -1.51558 - 1.17301I$	$-7.14017 - 11.20710I$	0
$u = 0.43735 + 1.45185I$ $a = -1.149860 - 0.022344I$ $b = 1.21403 - 0.98521I$	$-7.95756 + 5.21172I$	0
$u = 0.43735 - 1.45185I$ $a = -1.149860 + 0.022344I$ $b = 1.21403 + 0.98521I$	$-7.95756 - 5.21172I$	0
$u = -0.12280 + 1.51626I$ $a = -0.377043 + 0.062903I$ $b = 0.441833 + 0.292673I$	$-0.68412 - 1.98002I$	0
$u = -0.12280 - 1.51626I$ $a = -0.377043 - 0.062903I$ $b = 0.441833 - 0.292673I$	$-0.68412 + 1.98002I$	0
$u = 0.403739 + 0.208025I$ $a = 0.804446 - 0.453238I$ $b = -0.259208 - 1.215850I$	$4.93158 + 1.73284I$	$1.22516 - 5.83487I$
$u = 0.403739 - 0.208025I$ $a = 0.804446 + 0.453238I$ $b = -0.259208 + 1.215850I$	$4.93158 - 1.73284I$	$1.22516 + 5.83487I$
$u = -0.50070 + 1.46622I$ $a = -1.44297 - 0.11937I$ $b = 1.43093 + 1.14290I$	$-4.1159 - 17.6919I$	0
$u = -0.50070 - 1.46622I$ $a = -1.44297 + 0.11937I$ $b = 1.43093 - 1.14290I$	$-4.1159 + 17.6919I$	0

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.60050 + 1.43503I$ $a = -1.090220 - 0.150328I$ $b = 1.36060 - 0.72302I$	$-6.65882 + 7.54335I$	0
$u = 0.60050 - 1.43503I$ $a = -1.090220 + 0.150328I$ $b = 1.36060 + 0.72302I$	$-6.65882 - 7.54335I$	0
$u = -0.49169 + 1.48005I$ $a = 1.152940 - 0.055999I$ $b = -1.09293 - 0.91892I$	$-6.98154 - 8.93541I$	0
$u = -0.49169 - 1.48005I$ $a = 1.152940 + 0.055999I$ $b = -1.09293 + 0.91892I$	$-6.98154 + 8.93541I$	0
$u = 0.283569 + 0.325822I$ $a = -0.86667 + 2.61101I$ $b = 0.219477 + 0.269391I$	$-1.04332 + 1.10567I$	$-9.46807 + 3.92768I$
$u = 0.283569 - 0.325822I$ $a = -0.86667 - 2.61101I$ $b = 0.219477 - 0.269391I$	$-1.04332 - 1.10567I$	$-9.46807 - 3.92768I$
$u = -0.52905 + 1.51463I$ $a = 1.050270 - 0.039593I$ $b = -1.218100 - 0.659542I$	$-6.59608 - 4.70222I$	0
$u = -0.52905 - 1.51463I$ $a = 1.050270 + 0.039593I$ $b = -1.218100 + 0.659542I$	$-6.59608 + 4.70222I$	0
$u = 0.354922$ $a = -1.12692$ $b = 0.380191$	-0.829400	-12.4500
$u = 0.294507 + 0.068923I$ $a = 1.91812 - 1.72593I$ $b = 1.327900 + 0.309964I$	$-3.55911 + 0.66256I$	$-6.82987 - 9.28934I$

Solutions to I_1^u	$\sqrt{-1}(\mathrm{vol} + \sqrt{-1}CS)$	Cusp shape
$u = 0.294507 - 0.068923I$ $a = 1.91812 + 1.72593I$ $b = 1.327900 - 0.309964I$	$-3.55911 - 0.66256I$	$-6.82987 + 9.28934I$
$u = -0.206735 + 0.210541I$ $a = -0.51301 - 4.12782I$ $b = -1.264930 + 0.200555I$	$-0.32476 - 6.96628I$	$-7.63597 + 5.26059I$
$u = -0.206735 - 0.210541I$ $a = -0.51301 + 4.12782I$ $b = -1.264930 - 0.200555I$	$-0.32476 + 6.96628I$	$-7.63597 - 5.26059I$
$u = -1.88839 + 0.16543I$ $a = 0.0280191 + 0.0598057I$ $b = 0.473251 + 0.100354I$	$-1.16868 - 2.46445I$	0
$u = -1.88839 - 0.16543I$ $a = 0.0280191 - 0.0598057I$ $b = 0.473251 - 0.100354I$	$-1.16868 + 2.46445I$	0
$u = -0.14180 + 1.98107I$ $a = -0.190656 - 0.343084I$ $b = 0.270083 + 0.903599I$	$-2.44085 + 2.75616I$	0
$u = -0.14180 - 1.98107I$ $a = -0.190656 + 0.343084I$ $b = 0.270083 - 0.903599I$	$-2.44085 - 2.75616I$	0

II. $\boldsymbol{I_2^u = \langle 491u^{12} - 351u^{11} + \cdots + 2441b + 3926,\ 3175u^{12} + 6674u^{11} + \cdots + 4882a - 4765,\ u^{13} + u^{12} + \cdots + 2u - 1\rangle}$

(i) Arc colorings

$$a_5 = \begin{pmatrix} 1 \\ 0 \end{pmatrix}$$
$$a_8 = \begin{pmatrix} 0 \\ u \end{pmatrix}$$
$$a_4 = \begin{pmatrix} 1 \\ u^2 \end{pmatrix}$$
$$a_1 = \begin{pmatrix} -0.650348u^{12} - 1.36706u^{11} + \cdots - 1.98382u + 0.976034 \\ -0.201147u^{12} + 0.143794u^{11} + \cdots + 3.64154u - 1.60836 \end{pmatrix}$$
$$a_9 = \begin{pmatrix} u \\ u^3 + u \end{pmatrix}$$
$$a_2 = \begin{pmatrix} -0.495494u^{12} - 0.779189u^{11} + \cdots - 0.591766u + 0.104261 \\ -0.261368u^{12} + 0.192954u^{11} + \cdots + 4.32241u - 2.04711 \end{pmatrix}$$
$$a_3 = \begin{pmatrix} 0.880479u^{12} + 1.39349u^{11} + \cdots - 3.72522u + 0.700635 \\ -0.612864u^{12} - 1.03032u^{11} + \cdots - 0.519869u + 0.820565 \end{pmatrix}$$
$$a_{11} = \begin{pmatrix} -0.851495u^{12} - 1.22327u^{11} + \cdots + 1.65772u - 0.632323 \\ -0.201147u^{12} + 0.143794u^{11} + \cdots + 3.64154u - 1.60836 \end{pmatrix}$$
$$a_7 = \begin{pmatrix} 0.744879u^{12} + 1.74908u^{11} + \cdots + 1.39973u - 0.573023 \\ 0.798853u^{12} + 1.14379u^{11} + \cdots - 0.358460u + 0.391643 \end{pmatrix}$$
$$a_6 = \begin{pmatrix} 0.0437321u^{12} + 0.892872u^{11} + \cdots + 3.54127u - 1.68138 \\ 1.35190u^{12} + 1.24334u^{11} + \cdots - 4.52970u + 0.278165 \end{pmatrix}$$
$$a_{10} = \begin{pmatrix} -0.978748u^{12} - 0.0836747u^{11} + \cdots + 5.32861u - 2.05945 \\ 0.196641u^{12} + 0.635395u^{11} + \cdots + 3.45023u - 0.995903 \end{pmatrix}$$
$$a_{10} = \begin{pmatrix} -0.978748u^{12} - 0.0836747u^{11} + \cdots + 5.32861u - 2.05945 \\ 0.196641u^{12} + 0.635395u^{11} + \cdots + 3.45023u - 0.995903 \end{pmatrix}$$

(ii) Obstruction class $= 1$

(iii) Cusp Shapes $= -\frac{33641}{39056}u^{12} - \frac{24777}{19528}u^{11} + \cdots - \frac{452231}{39056}u - \frac{213017}{39056}$

(iv) u-Polynomials at the component

Crossings	u-Polynomials at each crossing
c_1	$u^{13} - 2u^{12} + \cdots + 7u + 1$
c_2	$u^{13} + 2u^{12} + \cdots + u - 1$
c_3	$2(2u^{13} + 5u^{12} + \cdots + 7u + 1)$
c_4	$u^{13} + u^{12} + \cdots + 2u - 1$
c_5	$u^{13} + 2u^{12} + \cdots - u - 2$
c_6	$u^{13} - 2u^{12} + \cdots + u + 1$
c_7	$2(2u^{13} + u^{12} + \cdots + 13u - 5)$
c_8	$u^{13} - u^{12} + \cdots + 2u + 1$
c_9	$2(2u^{13} - u^{12} + \cdots + 6u + 1)$
c_{10}	$2(2u^{13} - u^{12} + \cdots + 13u + 5)$
c_{11}	$u^{13} + u^{12} + \cdots - 5u - 2$

(v) Riley Polynomials at the component

Crossings	Riley Polynomials at each crossing
c_1	$y^{13} + 2y^{12} + \cdots + 25y - 1$
c_2, c_6	$y^{13} + 4y^{12} + \cdots - 11y - 1$
c_3	$4(4y^{13} - y^{12} + \cdots + 21y - 1)$
c_4, c_8	$y^{13} + 9y^{12} + \cdots - 6y - 1$
c_5	$y^{13} - 4y^{12} + \cdots + 21y - 4$
c_7, c_{10}	$4(4y^{13} - 65y^{12} + \cdots + 189y - 25)$
c_9	$4(4y^{13} + 19y^{12} + \cdots + 16y - 1)$
c_{11}	$y^{13} - 15y^{12} + \cdots + 21y - 4$

(vi) Complex Volumes and Cusp Shapes

Solutions to I_2^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u=-0.325948+1.074870I$ $a=\ \ 2.13139-0.98959I$ $b=-2.08257-0.08658I$	$-1.43580-8.24449I$	$-11.3041+10.0681I$
$u=-0.325948-1.074870I$ $a=\ \ 2.13139+0.98959I$ $b=-2.08257+0.08658I$	$-1.43580+8.24449I$	$-11.3041-10.0681I$
$u=\ \ 0.360305+0.702792I$ $a=-0.23551+1.84462I$ $b=-0.270408+0.367997I$	$-0.852875-0.473363I$	$-10.87019-3.13875I$
$u=\ \ 0.360305-0.702792I$ $a=-0.23551-1.84462I$ $b=-0.270408-0.367997I$	$-0.852875+0.473363I$	$-10.87019+3.13875I$
$u=\ \ 0.089681+1.215230I$ $a=-2.25917-0.12722I$ $b=\ \ 2.05969-0.84594I$	$-6.78588+1.52935I$	$-8.62170-4.17456I$
$u=\ \ 0.089681-1.215230I$ $a=-2.25917+0.12722I$ $b=\ \ 2.05969+0.84594I$	$-6.78588-1.52935I$	$-8.62170+4.17456I$
$u=-0.097116+0.522146I$ $a=\ \ 0.897260-0.736167I$ $b=-0.095808+1.315800I$	$4.14699+1.46163I$	$-8.28713-5.07807I$
$u=-0.097116-0.522146I$ $a=\ \ 0.897260+0.736167I$ $b=-0.095808-1.315800I$	$4.14699-1.46163I$	$-8.28713+5.07807I$
$u=\ \ 0.55292+1.47705I$ $a=-1.027900-0.056511I$ $b=\ \ 1.17981-0.80934I$	$-7.07568+6.46295I$	$-10.78671-4.43761I$
$u=\ \ 0.55292-1.47705I$ $a=-1.027900+0.056511I$ $b=\ \ 1.17981+0.80934I$	$-7.07568-6.46295I$	$-10.78671+4.43761I$

Solutions to I_2^u	$\sqrt{-1}(\mathrm{vol}+\sqrt{-1}CS)$	Cusp shape
$u = 0.420998$ $a = -1.44871$ $b = -1.13723$	-3.49272	-9.11080
$u = -1.29035 + 1.11018I$ $a = -0.031716 + 0.214422I$ $b = 0.277898 + 0.180723I$	$-1.05481 - 2.28411I$	$-28.6060 - 9.4367I$
$u = -1.29035 - 1.11018I$ $a = -0.031716 - 0.214422I$ $b = 0.277898 - 0.180723I$	$-1.05481 + 2.28411I$	$-28.6060 + 9.4367I$

III. u-Polynomials

Crossings	u-Polynomials at each crossing
c_1	$(u^{13} - 2u^{12} + \cdots + 7u + 1)(u^{87} + 3u^{86} + \cdots - 5484u + 667)$
c_2	$(u^{13} + 2u^{12} + \cdots + u - 1)(u^{87} + u^{86} + \cdots - 140u + 23)$
c_3	$4(2u^{13} + 5u^{12} + \cdots + 7u + 1)(2u^{87} - 17u^{86} + \cdots - 8u + 1)$
c_4	$(u^{13} + u^{12} + \cdots + 2u - 1)(u^{87} - 4u^{86} + \cdots + 343u + 49)$
c_5	$(u^{13} + 2u^{12} + \cdots - u - 2)(u^{87} - 3u^{86} + \cdots + 11633u + 2362)$
c_6	$(u^{13} - 2u^{12} + \cdots + u + 1)(u^{87} + u^{86} + \cdots - 140u + 23)$
c_7	$4(2u^{13} + u^{12} + \cdots + 13u - 5)(2u^{87} + 5u^{86} + \cdots + 9624u + 539)$
c_8	$(u^{13} - u^{12} + \cdots + 2u + 1)(u^{87} - 4u^{86} + \cdots + 343u + 49)$
c_9	$4(2u^{13} - u^{12} + \cdots + 6u + 1)(2u^{87} - 5u^{86} + \cdots + 1311u + 349)$
c_{10}	$4(2u^{13} - u^{12} + \cdots + 13u + 5)(2u^{87} + 5u^{86} + \cdots + 9624u + 539)$
c_{11}	$(u^{13} + u^{12} + \cdots - 5u - 2)(u^{87} + 2u^{86} + \cdots + 2885u + 538)$

IV. Riley Polynomials

Crossings	Riley Polynomials at each crossing
c_1	$(y^{13}+2y^{12}+\cdots+25y-1)$ $\cdot(y^{87}-13y^{86}+\cdots+17748096y-444889)$
c_2, c_6	$(y^{13}+4y^{12}+\cdots-11y-1)(y^{87}+45y^{86}+\cdots+11504y-529)$
c_3	$16(4y^{13}-y^{12}+\cdots+21y-1)(4y^{87}-13y^{86}+\cdots-4y-1)$
c_4, c_8	$(y^{13}+9y^{12}+\cdots-6y-1)(y^{87}+66y^{86}+\cdots+43561y-2401)$
c_5	$(y^{13}-4y^{12}+\cdots+21y-4)$ $\cdot(y^{87}+9y^{86}+\cdots-55400087y-5579044)$
c_7, c_{10}	$16(4y^{13}-65y^{12}+\cdots+189y-25)$ $\cdot(4y^{87}-285y^{86}+\cdots+12812724y-290521)$
c_9	$16(4y^{13}+19y^{12}+\cdots+16y-1)$ $\cdot(4y^{87}+103y^{86}+\cdots-17754781y-121801)$
c_{11}	$(y^{13}-15y^{12}+\cdots+21y-4)$ $\cdot(y^{87}-38y^{86}+\cdots+7135321y-289444)$