$$\hbar \supset A \text{ disc}$$

$$\hbar \llcorner A \supset \iota \underset{\text{hsu}}{\overset{\text{null}}{\subset}} \hbar: \quad \bar{\bar{\iota}} \subset \hbar \llcorner A$$

$$\gamma \in {}^{\hbar\llcorner A}\underset{\omega}{\triangle}\mathbb{C} \underset{\text{RES}}{\Longrightarrow} \int_{dw/2\pi i}^{\iota} {}^{w}\gamma = \sum_{a}^{\hbar\llcorner\bar{\bar{\iota}}} {}^{a}\text{Ind}_{\iota}\, {}^{a}_{\sharp}\gamma_{-1} = \sum_{a}^{\overset{<}{\iota}\,\cap A} {}^{a}\text{Ind}_{\iota}\, {}^{a}_{\sharp}\gamma_{-1}$$

$$\hbar \supset \overset{\lessgtr}{\iota} = \bar{\bar{\iota}} \cup \overset{<}{\iota} \text{ cpt} : \hbar \underset{\text{discr}}{\supset} A \Rightarrow \overset{\lessgtr}{\iota} \cap A = \overset{<}{\iota} \cap A \text{ fin } \Longrightarrow$$

$$\bigvee_{r>0} \bigwedge_{a}^{\overset{<}{\iota}\,\cap A} \text{disj } {}^{a}\overset{\lessgtr}{\mathbb{C}}{}^{r} \subset \overset{<}{\iota} \subsetneq \hbar \Rightarrow {}^{a}\overset{<}{\mathbb{C}}{}^{r} \cap A = {}^{a}\overset{<}{\mathbb{C}}{}^{r} \cap \underbrace{\overset{<}{\iota} \cap A} = a$$

$$z \in \hbar \llcorner \underbrace{\overset{<}{\iota} \cap A} \Longrightarrow {}^{z}\text{Ind}_{\iota}\, {}^{z}_{\sharp}\gamma_{-1} = 0$$

$$\hbar \llcorner \underbrace{\overset{<}{\iota} \cap A} = \underbrace{\hbar \llcorner A} \cup \underbrace{\hbar \llcorner \overset{<}{\iota}} \begin{cases} z \in \hbar \llcorner A & \Longrightarrow {}^{z}_{\sharp}\gamma_{-1} = 0 \\ z \in \hbar \llcorner \overset{<}{\iota} & \Longrightarrow {}^{z}\text{Ind}_{\iota} = 0 \end{cases}$$

$$\text{cycle } \mathfrak{t} = \iota - \sum_{a}^{\overset{<}{\iota}\,\cap A} {}^{a}\text{Ind}_{\iota}\, {}^{a}\overline{\overline{\mathbb{C}}}{}^{r} \Rightarrow \mathfrak{t}^{=} = \bar{\bar{\iota}} \cup \bigcup_{a}^{\overset{<}{\iota}\,\cap A} {}^{a}\overline{\overline{\mathbb{C}}}{}^{r} \subset \hbar \llcorner A: \quad {}^{z}\text{Ind}_{\mathfrak{t}} = {}^{z}\text{Ind}_{\iota} - \sum_{a}^{\overset{<}{\iota}\,\cap A} {}^{a}\text{Ind}_{\iota}\, {}^{z}\text{Ind}_{{}^{a}\overline{\overline{\mathbb{C}}}{}^{r}}$$

$$\overset{<}{\mathfrak{t}} \subset \hbar \llcorner A: \quad \mathfrak{t} \underset{\text{hsu}}{\overset{\text{null}}{\subset}} \hbar \llcorner A$$

$$z \in \mathbb{C} \llcorner \overset{<}{\iota} \Longrightarrow {}^{z}\text{Ind}_{\iota} = 0 = {}^{z}\text{Ind}_{{}^{a}\overline{\overline{\mathbb{C}}}{}^{r}} \Longrightarrow {}^{z}\text{Ind}_{\mathfrak{t}} = 0$$

$$z \in \overset{<}{\iota} \llcorner \underbrace{\hbar \llcorner A} = \overset{<}{\iota} \cap A \Rightarrow {}^{z}\text{Ind}_{\mathfrak{t}} = {}^{z}\text{Ind}_{\iota} - \sum_{a}^{\overset{<}{\iota}\,\cap A} {}^{a}\text{Ind}_{\iota} \underbrace{{}^{z}\text{Ind}_{{}^{a}\overline{\overline{\mathbb{C}}}{}^{r}}}_{= {}^{z}\delta_{a}} \underset{a \,\equiv\, z}{\equiv} {}^{z}\text{Ind}_{\iota} - {}^{z}\text{Ind}_{\iota} 1 = 0$$

$$\Longrightarrow 0 = \int_{dw/2\pi i}^{\mathfrak{t}} {}^{w}\gamma = \int_{dw/2\pi i}^{\iota} {}^{w}\gamma - \sum_{a}^{\overset{<}{\iota}\,\cap A} {}^{a}\text{Ind}_{\iota} \underbrace{\int_{dw/2\pi i}^{{}^{a}\overline{\overline{\mathbb{C}}}{}^{r}} {}^{w}\gamma}_{= {}^{a}_{\sharp}\gamma_{-1}}$$

$$\int_{dz/2\pi i}^{\overline{z-i}\,=\,\sqrt{2}} \frac{1}{z^2-2z+3} = \frac{1}{2i\sqrt{2}}$$

$$z^2-2z+3 = \left(z-a_+\right)\left(z-a_-\right) \Longrightarrow {}^{a_+}\mathrm{Res}\,\frac{1}{z^2-2z+3}$$

$$\int_{dz/2\pi i}^{\overline{z}\,=\,r} \frac{{}^{z}\text{ɿ}}{\left(z-a_1\right)\cdot\cdot\left(z-a_n\right)} = \sum_{1\,\leqslant\, i\,\leqslant\, n} \overbrace{{}^{a_i}\mathrm{Res} = {}^{a_i}\mathrm{Ev}\frac{{}^{z}\text{ɿ}}{\prod_{j\,\neq\, i}\left(z-a_j\right)}} = \sum_{1\,\leqslant\, i\,\leqslant\, n} \frac{{}^{a_i}\text{ɿ}}{\prod_{j\,\neq\, i}\left(a_i-a_j\right)}$$

$$\int_{dz/2\pi i}^{\overline{z}\,=\,4} \frac{{}^{z}\text{ɿ}}{(z-1)\,(z-2i)\,(z+3)}$$

$$\int_{dz/2\pi i}^{\overline{z-1}\,=\,r} \frac{z^2}{(z+1)\,(z-1)^2} = \begin{cases} {}^{-1}\mathrm{Res} = {}^{-1}\mathrm{Ev}\dfrac{z^2}{(z-1)^2} = \dfrac{1}{4} \\ {}^{1}\mathrm{Res} = {}^{1}\mathrm{Der}\dfrac{z^2}{(z+1)} = \dfrac{3}{4} \end{cases} = 1$$

$$\int_{dz/2\pi i}^{\overline{z}\,=\,1} {}^{\pi z}\mathfrak{t}$$

$$z = e^{it}$$