$$\begin{cases} X\times Y \xrightarrow{\text{ᔐ}} \bar{\mathbb{R}}_+ \\ Y \xrightarrow{{}^{x}\text{ᔐ}} \bar{\mathbb{R}}_+ \; {}^{x}\text{ʔ} = \left|{}^{x}\text{ᔐ}_{\cdot}\right| \end{cases} \Rightarrow \begin{cases} X \xrightarrow{\text{ʔ}} \mathbb{R} \\ |\text{ʔ}| \leqslant |\,\text{ᔐ}\,| \end{cases}$$

$$\begin{cases} \text{ᔐ} \leqslant \sum_k \text{ᔐ}^k \\ \text{ᔐ}^k \in {}^{X\times Y}{\triangle}^{0}_{0}\mathbb{R}_+ \end{cases} \Rightarrow \begin{cases} {}^{x}\text{ᔐ}_{\cdot} \leqslant \sum_k {}^{x}\text{ᔐ}^k_{\cdot} \\ {}^{x}\text{ᔐ}^k_{\cdot} \in {}^{Y}{\triangle}^{0}_{0}\mathbb{R}_+ \end{cases}$$

$${}^{x}\text{ʔ́}^k = \int_{dy}^{Y} {}^{x}\text{ᔐ}^k_{\cdot} = \int_{dy}^{Y} {}^{x}\text{ᔐ}^k_{y} \Rightarrow \frac{\text{ʔ́}^k \in {}^{X}{\triangle}^{0}_{0}\mathbb{R}_+}{{}^{x}\text{ʔ} = \left|{}^{x}\text{ᔐ}_{\cdot}\right| \leqslant \sum_k \int_{dy}^{Y} {}^{x}\text{ᔐ}^k_{\cdot} = \sum_k {}^{x}\text{ʔ́}^k}$$

$$\Rightarrow |\text{ʔ}| \leqslant \sum_k \int_{dx}^{X} {}^{x}\text{ʔ́}^k = \sum_k \int_{dx}^{X} \int_{dy}^{Y} {}^{x}\text{ᔐ}^k_{y} = \sum_k \int_{dxdy}^{X\times Y} \text{ᔐ}^k \Rightarrow |\text{ʔ}| \leqslant |\,\text{ᔐ}\,|$$

$${}^{\hbar}{\triangle}^{1}_{m}\mathbb{K} \bowtie {}^{\hbar'}{\triangle}^{1}_{m}\mathbb{K} \underset{\exists}{\leftarrow} {}^{\hbar\times\hbar'}{\triangle}^{1}_{m}\mathbb{K} \underset{\exists}{\leftarrow} {}^{\hbar}{\triangle}^{1}_{m}\, {}^{\hbar'}{\triangle}^{1}_{m}\mathbb{K}$$

$$\int_{d(u\times v)(x:y)}^{\hbar\times\hbar'} {}^{x}\text{ʔ}\; {}^{y}\text{ʔ}' = \int_{du(x)}^{\hbar} {}^{x}\text{ʔ} \int_{dv(y)}^{\hbar'} {}^{y}\text{ʔ}'$$

$$\int_{\iota\times\iota'}^{\hbar\times\hbar'} \text{ʔ} = \int_{\iota_{\hbar}}^{\hbar} \int_{\iota'_{\hbar'}}^{\hbar'} {}^{\hbar:\hbar'}\text{ʔ} = \int_{\iota'_{\hbar'}}^{\hbar'} \int_{\iota_{\hbar}}^{\hbar} {}^{\hbar:\hbar'}\text{ʔ}$$

$$\text{ᔐ} \in {}^{X\times Y}{\triangle}^{1}_{m}\mathbb{1}$$

$$X_0 = \frac{x \in X}{{}^{x}\text{ᔐ}_{\cdot} \in {}^{Y}{\triangle}^{1}_{m}\mathbb{1}}$$

$$X \xrightarrow{\text{ʔ}} \mathbb{1}$$

$$\bigwedge_{x \in X_0} {}^x\daleth = \int_{dy}^{Y} {}^x\wr_{.} = \int_{dy}^{Y} {}^x\wr_y$$

$$\underset{\text{FUB}}{\Longrightarrow} \; |\chi_{X \llcorner X_0}| = 0$$

$$\daleth \in {}^{X}\triangleright^{1}_{m} \mathbb{1}$$

$$\int_{dx}^{X} \daleth = \int_{dxdy}^{X \times Y} \wr$$

$$\bigvee \wr^j \in {}^{X \times Y}\triangleright^{1}_{m} \mathbb{1} \, || \wr - \wr^j \, || \leqslant 2^{-j}$$

$${}^x\daleth^j = \ulcorner {}^x\wr_{.} - {}^x\wr^j_{.} \urcorner = |\overline{{}^x\wr_{.} - {}^x\wr^j_{.}}| = |{}^x\overline{\wr_{.} - \wr^j_{.}}| \in \mathbb{R}_+ \underset{\text{Lem}}{\Longrightarrow} |\daleth^j| \leqslant |\overline{\wr - \wr^j}| = \ulcorner \wr - \wr^j \urcorner$$

$$X_1 = \frac{x \in X}{{}^x\daleth^j \rightsquigarrow 0} \Longrightarrow |\chi_{X \llcorner X_1}| = 0$$

$$\bigwedge_{0 \leqslant k} \bigwedge_{x \in X} {}^x\chi_{X \llcorner X_1} \leqslant \sum_{j \geqslant k} {}^x\daleth^j$$

$$\sum_{j \geqslant k} {}^x\daleth^j \underset{\text{OE}}{<} \infty \Longrightarrow {}^x\daleth^j \rightsquigarrow 0 \Longrightarrow x \in X \Longrightarrow {}^x\chi_{X \llcorner X_1} = 0$$

$$|\chi_{X \llcorner X_1}| \leqslant \sum_{j \geqslant k} |\daleth^j| \leqslant \sum_{j \geqslant k} 2^{-j} = 2^{-k} \rightsquigarrow 0 \Longrightarrow |\chi_{X \llcorner X_1}| = 0$$

$$\bigwedge_{x \in X_1} {}^x\wr^j_{.} \in {}^{Y}\triangleright^{1}_{m} \mathbb{1} \Longrightarrow || {}^x\wr_{.} - {}^x\wr^j_{.} || = {}^x\daleth^j \rightsquigarrow 0 \Longrightarrow {}^x\wr_{.} \in {}^{Y}\triangleright^{1}_{m} \mathbb{1} \Longrightarrow x \in X_0 \Longrightarrow X_1 \subset X_0 \Longrightarrow$$

$${}^x\chi_{X \llcorner X_0} \leqslant {}^x\chi_{X \llcorner X_1} \Longrightarrow |{}^x\chi_{X \llcorner X_1}| \geqslant |{}^x\chi_{X \llcorner X_0}| = 0$$

$${}^x\daleth^j = \int_{dy}^{Y} {}^x\wr^j_{.} = \int_{dy}^{Y} {}^x\wr^j_y \Longrightarrow \daleth^j \in {}^{X}\triangleright^{0}_{0} \mathbb{1}$$

$$\overline{\daleth - \daleth^{j}} \leqslant \lceil^{j} + \sum_{k \geqslant 0} \chi_{X \llcorner X_0}$$

$$\sum_{0 \leqslant k} {}^{x}\chi_{X \llcorner X_0} \underset{\text{OE}}{<} \infty \Rightarrow x \in X_0 \Rightarrow \overline{{}^{x}\daleth - {}^{x}\daleth^{j}} = \overline{\int_{dx}^{X} {}^{x}\backsim_{.} - \int_{dx}^{X} {}^{x}\backsim_{.}^{j}} = \overline{\int_{dx}^{X} \underbrace{{}^{x}\backsim_{.} - {}^{x}\backsim_{.}^{j}}}$$

$$\leqslant \int_{dx}^{X} \overline{{}^{x}\backsim_{.} - {}^{x}\backsim_{.}^{j}} = |\overline{{}^{x}\backsim_{.} - {}^{x}\backsim_{.}^{j}}| = || \, {}^{x}\backsim_{.} - {}^{x}\backsim_{.}^{j} \, || = {}^{x}\lceil^{j} \leqslant \text{RHS}$$

$$\Rightarrow \overline{\overline{\daleth - \daleth^{j}}} = |\overline{\daleth - \daleth^{j}}| \leqslant |\lceil^{j}| + \sum_{0 \leqslant k} |{}^{x}\chi_{X \llcorner X_0}| = |\lceil^{j}| \rightsquigarrow 0 \Rightarrow \daleth \in X_{\underset{m}{\triangle}}^{\;1} \rceil \underset{\text{Def}}{\Rightarrow}$$

$$\rceil \ni \int_{dx}^{X} \backsim \backsim \int_{dx}^{X} \daleth^{j} = \int_{dxdy}^{X \times Y} \backsim^{j} \rightsquigarrow \int_{dxdy}^{X \times Y} \backsim \Rightarrow \int_{dx}^{X} \daleth = \int_{dxdy}^{X \times Y} \backsim$$