Задача 01.

Намерете $P\big(\{\varnothing\} \times \{\{\varnothing\}\}\big) \times P(\varnothing)$.

Решение:
$$\{ \underbrace{\varnothing} \} \times \{ \underbrace{\{\varnothing\}}_b \} = \{a\} \times \{b\} = \{(a,b)\} = \{ \underbrace{(\varnothing,\{\varnothing\})}_c \}$$

$$P({c}) = {\emptyset, {c}} = {\emptyset, {(\emptyset, {\emptyset})}}$$

$$P(\emptyset) = \{\emptyset\}$$

$$P\big(\{c\}\big)\times P(\emptyset) = \{\emptyset,\{c\}\}\times\{\emptyset\} = \{(\emptyset,\emptyset),(\{c\},\emptyset)\} = \{(\emptyset,\emptyset),(\{(\emptyset,\{\emptyset\})\},\emptyset)\}$$