

RATIONAL PRODUCTS

Why

We want to multiply rationals.¹

Definition

Let $[(a,b)], [(b,c)] \in \mathbf{Q}$. The rational product of [(a,b)] with [(b,c)] is $[(ac,bd)]^2$.

Notation

We denote the rational product of $q, r \in \mathbf{Q}$ by $q \cdot r$.

¹Future editions will expand on this why.

²An account that this is well-defined will appear in future editions.

