Define a *rational* type, to operate with rational numbers and implement the following operations:

```c
rational zero ();
rational fixa (int num, int den);

int numerator ();
int denominator ();

rational sum (rational q1, rational q2);
rational sub (rational q1, rational q2);
rational mul (rational q1, rational q2);
rational div (rational q1, rational q2);

double real (rational q);

void print (rational q);
```

**Observation**

You only need to submit the required procedure; your main program will be ignored.

**Problem information**

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