



Starting at 7:05 am

Enjoy the song 🐰

Today's Content :

1. Revise Initial Rules
2. Evaluating Expression
3. Quizzes
4. Data Types

Quick Recap :

Rule 1: Statements should end with a semi-colon ;

↳ `System.out.print (150);`

Rule 2: JAVA is case-sensitive

↳ `System` and `system` are different

Rule 3: To print text → use double quotes " "

↳ `System.out.print ("Priyanshi");`

Rule 4: `{ }`, `()`, `" "` → they come in pairs

Rule 5: Comments → statements that compiler will ignore

Single Line → `//`

Multi Line → `/*
..... */`

Rule 6: `print` → type the output

`println` → type the output and press Enter

↓
cursor goes to
next line

Expression Evaluation →

System.out.print (6 * 7 / 6);

←
/ first → $6 * 1$
* second → 6

→
* first → $42 / 6$
/ second → 7

Based on the order of operators, we get different answer.

Priority in operators →

Rank 1: ()

Rank 2: * , / → same priority

Rank 3: + , - → same priority

With same priority operators, which ever comes first from left to right will be evaluated first.

$6 * 7 / 6$

→ * first

→ $42 / 6$

→ 7

Quiz.

`System.out.print (4+3*6-7/2);`

$$4 + \underline{3 * 6} - 7 / 2$$

$$\Rightarrow 4 + 18 - \underline{7 / 2}$$

$$\Rightarrow \underline{4 + 18} - 3$$

$$\Rightarrow 22 - 3$$

$$\Rightarrow 19$$

Text + Text →

`System.out.print (10+5);` → 15

`System.out.print ("Air" + "port");` → Airport

`System.out.print ("Sun" + "flower");` → Sunflower

Operator → +

Operands → "Sun", "flower"

Rule. With + operator, if one of operand is text then

we concatenate both operands

↳ attach them

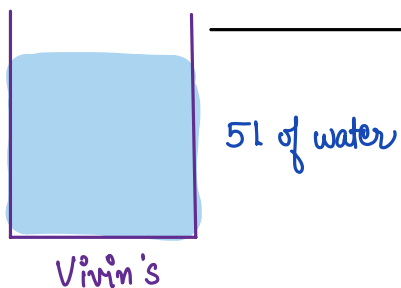
Intro to Data Types

Numbers →

1. Decimal

2. Non-decimal/Integers

Story:



Containers:

Type of container: Water

Name of container: Vivin's

Value of container: 5L



→ Type: Integer

→ Type of container
int x;
→ Name of container
x = 24;
→ Value of container

In programming, container ↔ variable

int y; Declaration

y = 20; Initialisation

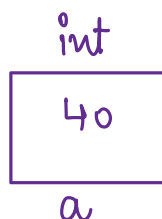


→ variable type: int
→ variable name: y
→ variable value: 20

Way 1:

int a;

a = 40;

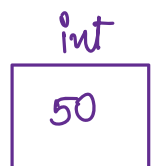


Way 2:

int b = 50;

Declaration

Initialisation b



Rules Recap →

- In JAVA when we divide integers (/) we only get quotient.
- Division by 0 is not possible with integers → we get error
- Priority of operators →

1. ()
2. $\times, /$
3. $+, -$

When two operators of different priority are there, we evaluate one with highest priority.

When two operators of same priority are there, we evaluate first from left to right.

- With + operator , if one of the operand is "text" we concatenate both operands.
- With text operands , we can only use + operator
- Creating a variable →

`type name = value ;`

- [illegible]

When we use variable name, we use its value