

1.10 Calling Class Methods

Name: _____ Class: _____ Date: _____

Total: 9 marks

KEY WORDS class (static) method 类方法 • object 对象 • class 类 • expression 表达式
• type 类型

Objective

Build the skills to answer exam questions on **calling class methods**.

You must be able to:

- understand that a **class method** 类方法 (a **static** method) belongs to the class
- call one with `ClassName.methodName(arguments)`
- distinguish a value-returning method from a **void** method
- use a returned value inside a larger expression

1 Worked examples

Study these first. Each one shows the method for a question type used later.

■ Class (static) methods

A **static** method belongs to the **class**, not to an object, and is called as `ClassName.methodName(arguments)`, e.g. `Math.max(3, 8)`.

■ Returning a value vs void

Some methods **return** a value you can use; a **void** method returns **nothing**. A returned value can be used in a larger expression: `int x = Math.max(3, 8) + 1;`

2 Practice

2.1 State how you call a **static** (class) method.

[1]

2.2 State the difference between a value-returning method and a **void** method.

[2]

2.3 State the value of `Math.max(3, 8)`.

[1]

3 Exam-style questions

3.1 A class (static) method is called using

[1]

A	B
C	D

A `object.method()`

B `ClassName.method()`

C `new Class()`

D just the method name

3.2 A void method

[1]

A	B
C	D

A returns a number

B returns nothing

C must be non-static

D always causes an error

3.3 The call `Math.min(10, 4)` is used.

(a) State its return value.

[1]

(b) State the general syntax for calling a static method.

[1]

(c) State the value of `x` after `int x = Math.min(10, 4) + 1;`

[1]