

# PUBLIC GOODS

## **Public goods: what are they and why does the government provide them?**

In our society, we make use of all sorts of goods and services every day. Some of these we buy ourselves, such as clothes, food or a smartphone.

Other goods are available to everyone without you having to pay for them directly. Think, for example, of street lighting, public parks or the police. We refer to this latter category as public goods.

In this text, we explain what public goods are, why the government provides them and how they differ from other types of goods. In doing so, we use the key criteria of excludability and rivalry. We also discuss the problem of free-rider behaviour.

### **1) Excludability and rivalry: the basics**

To classify goods, economists use two key criteria:

#### 1. Excludability

This refers to whether people can be prevented from using a good.

\* If you can prevent someone from using it (for example, by charging a price), then it is excludable.

\* If that is not possible, it is non-excludable.

## 2. Rivalry

This refers to whether one person's use of a good reduces another person's ability to use it.

\* If this is the case, the good is rivalrous.

\* If several people can use it at the same time without hindering one another, it is non-rivalrous.

Using these two criteria, we can classify goods into four types: public goods, private goods, club goods and common goods.

### **2) What are public goods?**

Public goods are goods that are both non-excludable and non-rivalrous.

\* Non-excludable: it is not easy to prevent anyone from using them.

\* Non-rivalrous: one person's use does not reduce the availability for others.

Examples:

\* Street lighting: everyone can use it.

\* Public Wi-Fi in a city (to a certain extent).

\* Police and fire services: protection applies to everyone.

\* National defence.



When you walk down the street in the evening, you benefit from street lighting. But other people are doing the same at the same time, without your use reducing theirs. Moreover, it would be difficult for the authorities to say: “You’re not allowed to use the light because you haven’t paid for it.”

### **3) Why does the government supply public goods?**

The main reason is that the market often fails to provide these goods effectively. This is mainly due to the free-rider problem.

The free-rider problem

Free-riders are people who benefit from a good without paying for it. Because public goods are non-excludable, people can use them without contributing.

Example:

Suppose street lighting is provided by a company and only works if everyone pays. Many people would think: “I won’t pay, because the lights are there anyway.” If too many people think this way, the company makes no profit and stops providing the service. Result: there is no street lighting at all.

Consequence:

Because companies cannot make a profit from public goods, they will not provide them, or will provide too few. That is why the government intervenes and ensures that these goods are available, usually paid for through taxes.

This is an example of market failure.

#### **4) Other types of goods**

In addition to public goods, there are three other types. These are also defined by excludability and rivalry.

##### 1. Private goods

Private goods are excludable and rivalrous.

\* Excludable: you have to pay to obtain them.

\* Rivalrous: if you use it, someone else cannot use it.

Examples:

- \* Trainers
- \* Your smartphone
- \* Food (pizza, snacks)
- \* Games you buy

If you eat a pizza, someone else cannot eat that same pizza. And if you don't pay, you won't get it. That is why these are typical private goods.



## 2. Club goods

Club goods are excludable but non-rivalrous (up to a certain limit).

- \* You can exclude people (for example, via a subscription).
- \* Several people can use it at the same time without any problems (until it gets busy).

Examples:

- \* Netflix or Spotify
- \* Gym membership
- \* Online game servers



You have a Netflix account. Only people with an account can watch (excludable). But it doesn't matter whether you or someone else is watching at the same time (non-rivalrous), unless the system becomes overloaded.

### 3. Common goods

Common goods are non-excludable, but they are rivalrous.

\* Anyone can use them.

\* But use by one person reduces the amount available for others.



Examples:

- \* Fish in the sea
- \* Forests
- \* Public skateparks (when they're busy)
- \* Free public space

A skatepark is accessible to everyone (non-exclusive). But when it's very busy, there's less space to skate (competitive).

### **5) Free-rider problem in daily life**

Free-riding behaviour isn't limited to public goods; it also occurs in young people's lives.

Examples:

1. Group projects at school

Some pupils do very little, yet still receive the same mark.

2. Sharing streaming accounts

Someone uses your Netflix account without contributing to the cost.

3. Ordering food together

Someone eats with you but pays less or nothing at all.

In all these cases, someone benefits without contributing their fair share. This may seem harmless, but on a larger scale it can cause systems to break down.

Why is this important?

Understanding public goods and free-rider behaviour helps us understand why the government exists and why we pay taxes.

Without the government, many important services would:

- \* Not exist
- \* Or be available only to those who can afford them

Think of:

- \* Security
- \* Infrastructure (roads, bridges)
- \* Environmental protection

## **6) Conclusion**

Public goods are essential to the functioning of a society. They are characterised by the fact that they are non-excludable and non-rivalrous. Because it is difficult for businesses to make a profit from them due to the free-rider problem, the government takes on the responsibility of providing these goods.

This is an example of market failure.