

# PROPORTION



## **The Skills You Need Guide to Numeracy**

All you ever wanted to know about maths, but never liked to ask...

### **PART 2**

# **PROPORTION**

Skills You Need

This is one of a series of eBooks  
by Skills You Need available for sale at:

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# INTRODUCTION: UNDERSTANDING MORE ADVANCED NUMBERS

Numeracy skills are really important.

**We said in the first book in this series (*The Skills You Need Guide to Numeracy Part 1. Fundamentals of Numeracy*) that people with better numeracy skills have better paid jobs, better well-being and experience less stress.**

It is no longer acceptable to say that you just can't do maths. Numeracy skills are required in some form in almost any job, from being able to count out change in a retail environment, through to the complex calculations required of structural engineers.

In many countries, including the United Kingdom, children and young people are expected to study maths until the age of 16. However, almost half of the working-age population of England (17 million people) only have the level of numeracy that is expected for an 11-year-old child. This problem is seen in other countries too—and it affects your life chances.

Adults with poor numeracy skills are twice as likely to be unemployed than those who enjoy some competency in numeracy. Those adults with at least basic numeracy skills can expect to earn a quarter more than those who lack the necessary skills to solve basic mathematical problems.

Those with poor numeracy skills are less likely to be able to save money on day-to-day affairs, like a visit to the supermarket.

They are also less likely to be able to find or negotiate the best deals on financial products, and therefore more likely to pay higher levels of interest on higher levels of debt. It is well documented that debt problems can lead to stress and/or depression. Between a third and a half of people with poor numeracy skills have a desire to improve them but less than 4% have actually attended any numeracy classes.

# DEVELOP YOUR NUMERACY SKILLS

**At SkillsYouNeed, we believe that everybody has the ability to master basic numeracy.**

We also believe that understanding basic numeracy and mathematics will make a huge difference in all aspects of your life: it will make you more employable, help you achieve a greater understanding of the world around you, save you time and money, and may even improve your well-being and reduce stress.

This series of books brings together all our content on basic numeracy. It uses clear descriptions, discussion and examples to provide a fundamental knowledge of ‘functional numeracy’—the maths that you need every day.

We don’t all need to be great mathematicians, and we’re certainly not all rocket scientists. However, an understanding of the basic principles of day-to-day numeracy, arithmetic and maths will open many doors.

# 1

## DECIMALS AND FRACTIONS

**Both decimals and fractions describe parts of a whole.**

Fractions and decimals are two different ways to represent parts of a whole number. Decimals are a way to express tenths, hundredths, thousandths (and beyond) of a unit.

Working with both decimals and fractions may look a bit complex to start with but, don't worry, they're only numbers and they obey rules like other numbers.

**The full eBook  
is available at**

**[www.skillsyouneed.com](http://www.skillsyouneed.com)**