

# the BASICS

CHESTER ZOO

OIL CAN BE EXTRACTED FROM TWO PARTS OF THE FRUIT: THE OUTER FLESH AND THE SEED, OR KERNEL.

PALM FRUIT FLESH



PALM KERNEL

Palm oil from the flesh produces **EDIBLE PALM OIL** which you'll find in food products

Palm kernel oil or its derivatives are **WIDELY USED** IN COSMETICS, DETERGENTS and CHEMICALS

Palm oil kernels **CAN BE ROASTED AND EATEN** or ground into flour

EACH INDIVIDUAL PIECE OF FRUIT CONTAINS **50% OIL** and the fruit can be **HARVESTED ALL YEAR ROUND**

In well-managed plantations, palm oil **FRUIT PRODUCES 3-8 TIMES MORE OIL** from a given area than **ANY OTHER TROPICAL** or **TEMPERATE OIL CROP**

The plants can only grow in areas **10° north or south** of the equator. These are also the most **biodiverse** areas on the planet



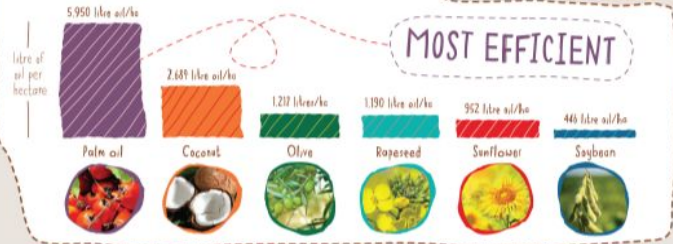
TO GROW PALM OIL TREES YOU NEED

- 1780-2280mm rainfall per year
- 2-4 month dry period
- 21-24°C mean minimum temperature

## ...the COMPARISON

Palm oil isn't the only vegetable oil you'll find in your food. But how does it compare?

WHICH PLANT PRODUCES THE MOST OIL?



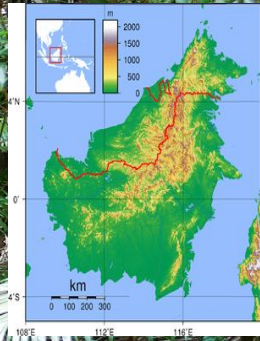
**MOST EFFICIENT**

IF DEMAND FOR OIL ISN'T MET BY PALM OIL, OTHER CROPS MORE DEMANDING ON THE ENVIRONMENT WILL TAKE ITS PLACE

BECAUSE OTHER CROPS ARE LESS EFFICIENT, THIS WILL CONVERT EVEN MORE LAND INTO USE FOR AGRICULTURE

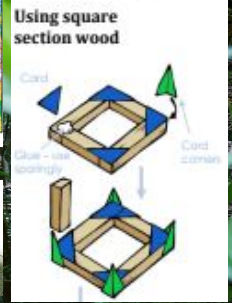
# Knowledge Organiser: Fragile Earth

**Borneo** is the third largest island in the world. It is in the center of maritime southeast Asia. This island is part of three different countries. Indonesia, Malaysia and Brunei each have part of Borneo. Indonesia's region is called "Kalimantan" (although Indonesians use this word for the whole island). Malaysia's region of Borneo is called East Malaysia or Malaysian Borneo. The independent nation of Brunei is a small part of the island. Borneo has a rainforest that is in danger because it is valuable. Lumber companies cut trees here illegally.



Deforestation	Process by which natural forests are cleared of trees
Afforestation	To convert empty land into a forest
Reforestation	To replant trees
Ecosystem	A system of interconnected elements formed by community's interaction
Clear cutting	A section of trees which have been cut down
Forest degradation	Reduction in the capacity of a forest
Slash and burn	Method of agriculture, vegetation is felled and burned

## TAKE SHELTER SURVIVAL TENTS



**17. Key vocabulary**

frame structure, stiffen, strengthen, reinforce, triangulation, stability, shape, join, temporary, permanent

design brief, design specification, prototype, annotated sketch, purpose, user, innovation, research, functional

