

## **Coal**

*The coal series*

*Pa I F 20 min*

*Students plot composite bar charts to show the changing percentages of carbon, oxygen and hydrogen. A ten centimetre bar is drawn for each of: vegetation, peat, lignite, bituminous coal and anthracite. Each bar is subdivided to show the percentages of C, O and H.*

*Volume of coal*

*A I 20 min*

*Students calculate the volume of coal from a map with borehole data. Students use the vertical thickness (not the true thickness) and multiply this by the area. Using this method the dip of the beds does not need to be taken into consideration. Devise a map where the coal seams varies in depth, thickness and ash content so students must eliminate areas where the seam is too deep, too thin or has too high an ash content. The map has a grid on it so that the areas can be worked out by counting squares.*