The present and future of energy in India - Andrew Hunter

Background

At 12 MM BOE India is the fourth largest consumer of energy after China, the US and Russia. However it only produces about 1 MM barrels of oil and two thirds of its requirements are met by burning indigenous coal. Meeting climate guidelines will therefore be a challenge as long as this is the case, and solar would seem to be an obvious answer given the amount of sunshine available.

But this is a very big and diverse country. There are many competing interests and there will be many impediments to rapid progress towards meeting a smaller carbon footprint economically.

Task

Compare and contrast the supply and demand profiles in India, China, Russia and the US in 2004 and again in 2014. What were the drivers that changed the energy picture in each country over that 10 year period?

Then construct some simple algorithms (for example, the ratio of car ownership to fuel demand) that enable you to project supply and demand under various scenarios. The appropriate scenarios will have emerged as you carry out the comparison in the first step – for example, the effect of slow and fast gdp growth on energy demand.

Summarize this project by combining this analysis with Indian Energy Policy.

You will have to sift through a large amount of information. What is required here will not be new but you should aim to make it enlightening.