Table 8.2 Possible hierarchies of mode

Physics	Chemistry	Economy	Energy (per head)	Geography (range)
1. Fast-heavy	1. Motor vehicle with direct noxious emissions	1. Taxi	1. Motorised solo occupancy	1. Motorised modes with unlimited range at urban scale
2. Slow-heavy or fast-light	2. Motor vehicle powered by source with noxious implications	2. Motor vehicle	2. Motorised HOV (high occupancy vehicle)	2. Bicycle (medium range)
3. Slow-light	3. Other vehicle (manufacture and disposal)	3. Human-powered vehicle	3. Bicycle	3. Walk (short range)
	4. Pedestrian	4. Walk	4. Walk	

The categories in Table 8.2 relate to what makes modes more favourable from the perspective of society and sustainability. That is, from the point of view of accident risk, health, affordability (equity) and ecology, each spectrum reads downwards from 'worst' to 'best'. However, seen from the individual user's perspective, the favourability tends to be the other way around. In other words, very generally speaking, the most convenient modes are the least 'sustainable': hence the challenge for policy-makers.

The modegram

In fact, it is possible to draw different kinds of spectrum together, and express the 'modal kaleidoscope' as a single triangular construct with walking at one vertex, public transport at another, and the car (or individual motorised transport) at the third. The resulting 'modegram' can be used to map out any mode relative to any other (Figure 8.4).[9]

Although triangular, there are effectively two independent axes implied. The first, along the right-hand bound, is the spectrum from the pedestrian to the car. This is a spectrum of mechanisation, from unassisted human locomotion to full motorisation (Figure 8.5). The second, along the left-hand bound, could be vehicle occupancy, from the solo car (or motorcycle, etc.) to the high occupancy train (Figure 8.6). In this sense, the axes of the modegram relate roughly to equating favoured modes with those which carry more people in fewer 'offensive' vehicles.

Operational complementarity

The issue of 'greenness' versus 'convenience' is not just a matter of which individual modes are considered favourable, but how modes link to each