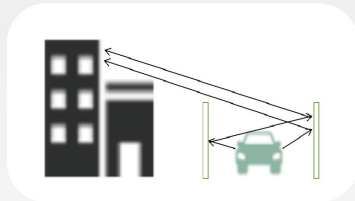


Noise Barrier Construction Plan: PV Material and Green Wall

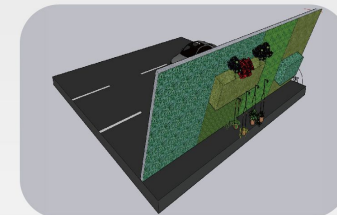
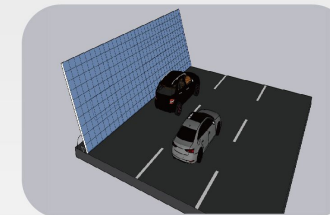
Group 3 members:

Xuyuan Ge
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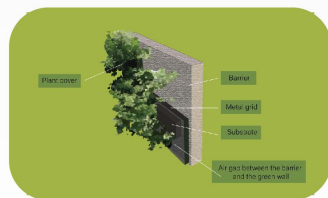
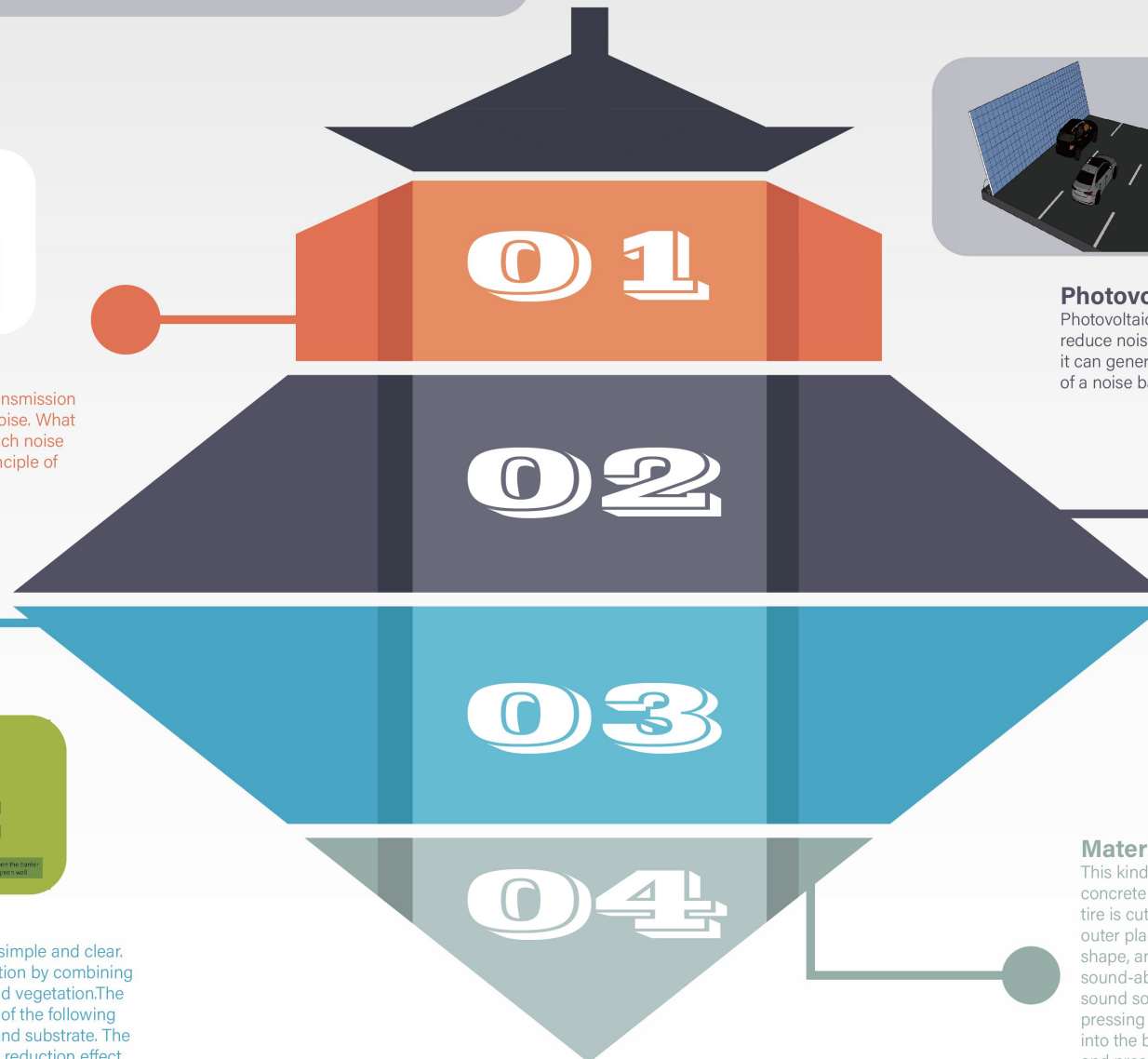
Sound reflection

The reflection of sound will strengthen the transmission of noise, which is part of the source of road noise. What we have to do is to reduce the reflection of such noise as much as possible, so as to achieve the principle of noise reduction on the road.



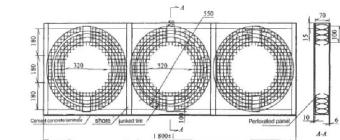
Photovoltaic noise barriers

Photovoltaic noise barriers are technology designed to reduce noise pollution generated by road traffic, and it can generate clean energy. The structure is composed of a noise barrier system with a PV module.



'Green Wall'

'Green Wall' structure is actually very simple and clear. Its significance lies in the noise reduction by combining with the barrier of inclination angle and vegetation. The structure of 'Green Wall' is composed of the following parts: barrier, plant cover, metal grid and substrate. The emphasis of this structure is the noise reduction effect of plants. Plant cover is the main part of noise reduction, and the selection of vegetation is very important.



Composite sound absorption barrier structure of waste tire

Material usage

This kind of sound absorption barrier is composed of cement concrete pressure panel and waste tire. The waste automobile tire is cut along the tread and divided into two parts. Then the outer placenta is fixed in the sound barrier box in a cake shape, and the gap is filled with glass fiber wool or porous sound-absorbing material. The panel facing the road traffic sound source is made of perforated cement concrete and pressing plate. The holes allow the sound energy to penetrate into the box. The back plate is made of 10 mm cement concrete and pressing plate for sound insulation.