

## Coursework ideas for extending PGE

- you can implement frozen bubble if you wish
  - or another game
  - your game should use your game engine extensions somehow
    - even if just for eye candy!

## extending PGE

- per object elasticity could be implemented
- invisible colour
- `unfix` (although this is very easy!)
- getters and setters for many of the attributes of the objects
  - feel free to change the naming scheme of the API to use `get/set`
    - rather than `get/put`
- implementing a library of objects Python side
  - staircase (preferably scalable)
  - box, chair, table etc (preferably scalable)

## extending PGE

- it would be interesting to be able to obtain the
  - angular velocity of an object
- introduce limits for the impulse of an object
  - call a call back function in Python if this is exceeded
- introduce limits for the angular velocity of an object
  - call a call back function in Python if this is exceeded
- ability to obtain the coordinates of the vertices an object
- these new API calls would give the game engine users/programmers the ability to
  - make objects shatter if they spin too quickly

- or destruct if they hit the floor too hard etc

## extending PGE

- allow users to change the colour of an object
- expose `rotate` in `twoDsim.c` of a polygon to the python API