



Science Boffins  
 Devonshire House  
 Manor Way  
 Borehamwood WD6 1QQ  
 T: 020 8953 5566  
 E: admin@ScienceBoffins.com  
 www.ScienceBoffins.co.uk

## RISK ASSESSMENT

Event: Assembly 1 Risk Assessment

Date:

| <b>Likelihood: how likely is it that the harm presented by the hazard will actually occur?</b> | <b>Severity: what impact or damage could the harm presented by the hazard have on a person or persons?</b> |
|--|--|
| <b>High (3):</b> Harm is certain, or near certain, to occur                                    | <b>High (3):</b> Death or major injury   |
| <b>Medium (2):</b> Harm will often occur   | <b>Medium (2):</b> 7 day injury or illness   |
| <b>Low (1):</b> Harm will seldom occur   | <b>Low (1):</b> All other injuries or illnesses  |

**Risk rating:** Once the likelihood and severity have been determined, the risk can be calculated as shown below:

|          | Likelihood |      |        |
|----------|------------|------|--------|
| Severity | 3          | 2    | 1      |
| 3        | High       | High | Medium |
| 2        | High       | High | Medium |
| 1        | Low        | Low  | Low    |

| <b>Hazard</b>                 | People affected | Risk Rating (L x S = R) |   |   | Control Measures                             | Residual Risk Rating (L x S = R) |   |   |  |
|-------------------------------|-----------------|-------------------------|---|---|--|----------------------------------|---|---|--|
| <b>3 Cup Monty</b>            |                 | <b>Assessor: DGH</b>    |   |   | <b>Date: 05/03/2015</b>                      |                                  |   |   |  |
| Slip caused by water spillage | Anyone present  | L                       | L | L | Any spilt water must be wiped up immediately | L                                | L | L |  |

|   |  |                      |   |   |   |   |   |   |  |
|---|--|----------------------|---|---|---|---|---|---|--|
| <b>Bernoulli's Toilet Roll</b>          |  | <b>Assessor: DGH</b> |   |   | <b>Date: 01/05/2015</b>   |   |   |   |  |
| Colliding Heads (Catching Toilet Paper) | Very young children who are over excited | L                    | L | L | Very young children should be warned to stay in their places and not to rush about trying to catch the toilet paper | L | L | L |  |

| <b>Hazard</b>   | People affected         | Risk Rating (L x S = R) |   |   | Control Measures   | Residual Risk Rating (L x S = R) |   |   |
|---|-------------------------|-------------------------|---|---|--|----------------------------------|---|---|
| <b>Elephant's Toothpaste</b>  | <b>Assessor: DGH</b>    |                         |   |   | <b>Date: 22/06/2013</b>  |                                  |   |   |
| Hydrogen Peroxide can cause oxidisation                                   | Presenter               | L                       | M | M | Presenter to wear gloves and safety glasses  | L                                | L | L |
| Split Hydrogen Peroxide can damage material by oxidisation                | Presenter               | L                       | M | M | Hydrogen Peroxide to be kept in vented bottle with appropriate label with lid tightly closed when not in use                             | L                                | L | L |
| Iodine can permanently stain material black or yellow                     | Audience                | L                       | L | L | Potassium Iodide can leave a stain. Do not allow the audience to touch foam or get it on their clothes                                   | L                                | L | L |
| Oxygen test - Children may play with fire, out of school and unsupervised |                         | L                       | M | M | Always give appropriate fire warning that children must never play with fire   | L                                | L | L |
| Oxygen Test - risk of localised fire                                      | Audience and Presenter  | L                       | M | M | Ensure that spills are fully extinguished  | L                                | L | L |
| Oxygen Test - Tripping a smoke alarm                                      | Audience and Presenter  | L                       | L | L | If possible have smoke alarms disengaged for the duration of the presentation else ensure that the quantity of smoke produced is minimal | L                                | L | L |
| Exothermic Reaction may cause slight burn on skin                         | Audience and Presenter  | L                       | L | L | Do not allow anyone to touch the experiment and equipment whilst it is still hot   | L                                | L | L |
| Foam may over flow and damage table cloth, table and floor                | Presenter and equipment | L                       | L | L | Do not exceed the recommended quantities   | L                                | L | L |

|                      |                          |   |   |   |                         |   |   |   |
|----------------------|--------------------------|---|---|---|-------------------------|---|---|---|
| <b>Energy Sticks</b> | <b>Assessor: Dsimons</b> |   |   |   | <b>Date: 14/09/2018</b> |   |   |   |
| No known hazard      |                          | L | L | L |                         | L | L | L |

| <b>Hazard</b>                      | People affected        | Risk Rating (L x S = R) |   |   | Control Measures   | Residual Risk Rating (L x S = R) |   |   |
|------------------------------------|------------------------|-------------------------|---|---|--|----------------------------------|---|---|
| <b>Lend Me a Hand</b>              |                        | <b>Assessor: DGH</b>    |   |   | <b>Date: 05/03/2015</b>  |                                  |   |   |
| Component B - Polymeric Isocyanate |                        | L                       | L | L | Irritant to eyes and skin - slightly flammable   |                                  |   |   |
| Mixture on skin                    | Audience and Presenter | L                       | L | L | All volunteers and presenters must have as minimal skin exposed to the reaction mixture.                                   | L                                | L | L |
| Component A - Polyol               |                        | L                       | M | M | Serious irritant to eyes   |                                  |   |   |
| Glove overfilled and bursts        | Audience and Presenter | M                       | L | L | Less is more, only add a small amount of the mixture into the glove as it will expand. Use stronger gloves where possible. | L                                | L | L |