## Case Study 3

**Group 6:**

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1.

Processing Preformed

* Needs to track employee movement around the entire building.
* Needs to control access to certain areas restricting them to the respected personnel
* Need to monitor motion, toxicity and temperature in different areas in the building based on keeping personnel safe.
* Ensure there's no motion in rooms given there should be no motion.
* Ensure Toxicity and Temperature are at safe levels

Inputs

* Motion
* Toxicity
* Temperature
* GPS location
* Access level

Outputs

* Changes made on monitor, toxicity, and temperature
* Location of employees on monitor and in system
* Access to restricted areas

Data

* Employee Access level
* Location
* Toxicity level
* Temperature level
* Motion detection

2.

[View attached file]

3.

**Juan - ACTOR**

* A worker at Big Bang INC
* One of the individuals that the system will be tracking/implementing access level restrictions.

**Shift Foremen - ACTOR**

* Workers at Big Bang INC
* The individuals who the system will be affecting, by tracking/implementing access level restrictions on them

**Kim - ACTOR**

* Director of corporate security
* In charge of all security-based protocols and is reaching out to developers to implement this system. Updating access levels, assignments access levels, and Investigating and/or evacuating areas if need be.

**Security Guards - ACTOR**

* In charge of security for their respective areas.
* In charge of investigating areas that have given a warning by motion, toxicity, or heat levels. Making sure individuals are not undergoing suspicious activity.

**Update worker's access areas - USE CASE**

* Updating individuals areas that they can access
* If someone in the company gets promoted or changes fields they may need to have their respective areas where they have access changed.

**Monitor workers' location - USE CASE**

* Track where individuals in the building are
* It’s been made clear it’s vital to know where every single employee in the building is because of multiple reasons such as security breaches if there needs to be an evacuation, etc.

**Record date when workers enter or leave an area - USE CASE**

* Keep data of past occurrences of employee entrances and exits in a given area
* We need to keep the data of entrances and exits of areas in case there is new knowledge of something going wrong with a certain product or maybe it’s found out at a later date that there was a security breach and the stored information will become crucial.

**Implement GPS inside keycards - USE CASE**

* Method to achieve location tracking
* This way we will ensure the knowledge of all the individuals in the building because we know they need to keep their key cards on them to access their respective areas.

**Record employee location and date - USE CASE**

* Data is stored for location and date of employees
* Storing these locations and dates will be vital for future situations given there may be security breaches, and/or negative actions toward products

**Investigate empty room if motion detected - USE CASE**

* Security guard ensures safety in rooms where motion is restricted.
* Security guards might need to take action on individuals breaching security, and/or tampering with company products

**Monitor toxicity in all building rooms - USE CASE**

* Monitored constantly to ensure site safety
* Ensures that if ambient levels become dangerous workers are notified
* If levels are deemed unsafe by the system a sitewide lockdown would be initiated. Keeping employees safe.

**Monitor temperature in all building rooms - USE CASE**

* Monitored constantly to ensure site safety
* If levels are deemed unsafe by the system a sitewide lockdown would be initiated. Keeping employees safe.

**Locate employees in emergency situations - USE CASE**

* Ensure that no employees are left in areas deemed unsafe by the system.
* Use the location tracking feature to see where each employee is during times of emergency.

**Emergency record keeping - USE CASE**

* Record important info during emergencies and incidents for record-keeping and insurance purposes
* Store employee information, date, time, location, heat, and toxicity levels after the event