SAS code lecture 4

**Data** tracking;

Input station intensity;

Cards;

1 20

1 1050

1 3200

1 5600

1 50

2 4300

2 70

2 2560

2 3650

2 80

3 100

3 7700

3 8500

3 2960

3 3340

;

**Proc** **glm**;

title "This is the fixed effect model";

Class station;

Model intensity=station/solution;

**Run**;

**quit**;

**Proc** **glm**;

title "This is the random effect model";

Class station;

Model intensity=station/solution;

Random station;

**Run**;

\*\*\* example 2 \*\*\*;

**data** temp;

do mode = 'I', 'C', 'S';

do temperature = **1** to **4**;

do rep = **1** to **2**;

input y @@;

output;

end;

end;

end;

cards;

12 16 15 19 31 39 53 55

15 19 17 17 30 34 51 49

11 17 24 22 33 37 61 67

;

run;

**proc** **glm**;

title "Fixed Effect model";

class mode temperature;

model y = mode|temperature;

**run**;

**quit**;

**proc** **glm**;

title "Mixed Effect Model";

class mode temperature;

model y = mode|temperature;

random temperature mode\*temperature/test;

**run**;

**quit**;

**proc** **mixed**;

title "Mixed Effect Model";

class mode temperature;

\*only fixed effect shows up at model statement;

model y = mode;

random temperature mode\*temperature;

**run**;

**quit**;