SHOULD I STAY OR SHOULD I GO: ONLINE EXPERIMENTS ON SELF-PROTECTION UNDER THREATENING SITUATIONS

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How would you act to a similar threatening situation?

Which factors influence on your protective decisions?

753 explosions and armed attacks

642 dead and 4547 injured

Developments to date

- Impact of attacks
- Behaviour of terrorists
- Behaviour of survivors

Gap → Few quantitative data on people's actions during threats.

Six experiments —combining→ Threat factor → Fire Alarm, Explosion and Shootings
Physical factor → Open area and Enclosure environment → 18 trials
Social factor → Individual, Group Stay, Group Go

EXPERIMENT 1		
Fire Alarm	Open area	Individual
Explosion	Open area	Group Go
Shootings	Open area	Group Stay

EXPERIMENT 2		
Fire Alarm	Enclosure	Individual
Explosion	Enclosure	Group Go
Shootings	Enclosure	Group Stay

EXPERIMENT 3		
Fire Alarm	Open area	Individual
Explosion	Open area	Group Go
Shootings	Open area	Group Stay

EXPERIMENT 4		
Fire Alarm	Enclosure	Individual
Explosion	Enclosure	Group Go
Shootings	Enclosure	Group Stay

EXPERIMENT 5		
Fire Alarm	Open area	Individual
Explosion	Open area	Group Go
Shootings	Open area	Group Stay

EXPERIMENT 6		
Fire Alarm	Enclosure	Individual
Explosion	Enclosure	Group Go
Shootings	Enclosure	Group Stay

DESIGN

Experiments and post-questionnaire

→

VIDEOS

3D visualization

Pathfinder

+

STIMULUS

Auditory and visual cues

Online format:

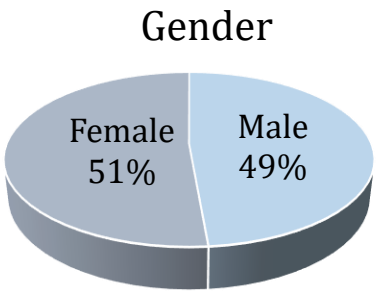
PsyToolkit

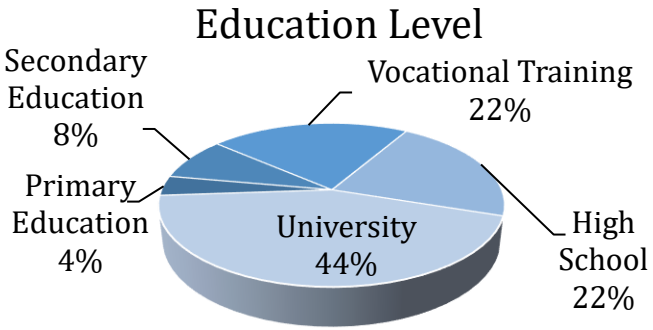
Fire Alarm

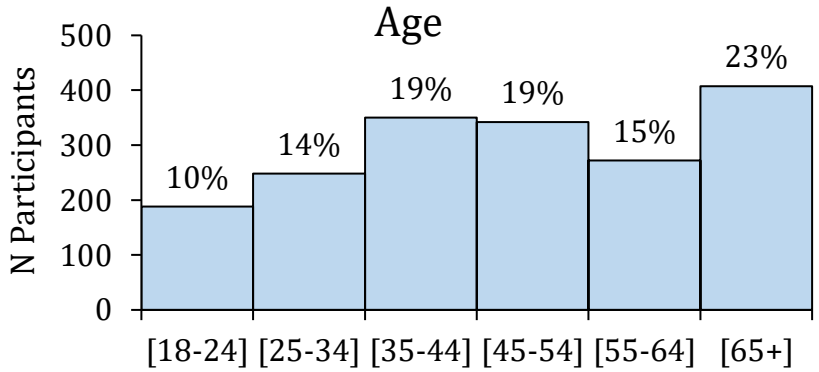
Explosion

Shootings

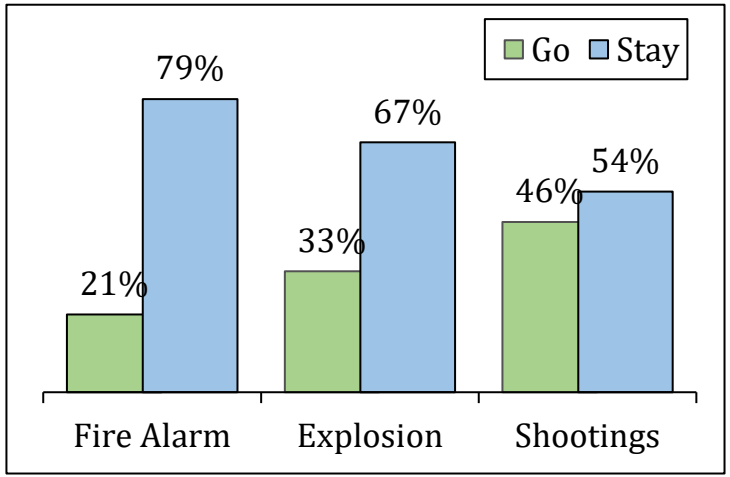
1807 participants



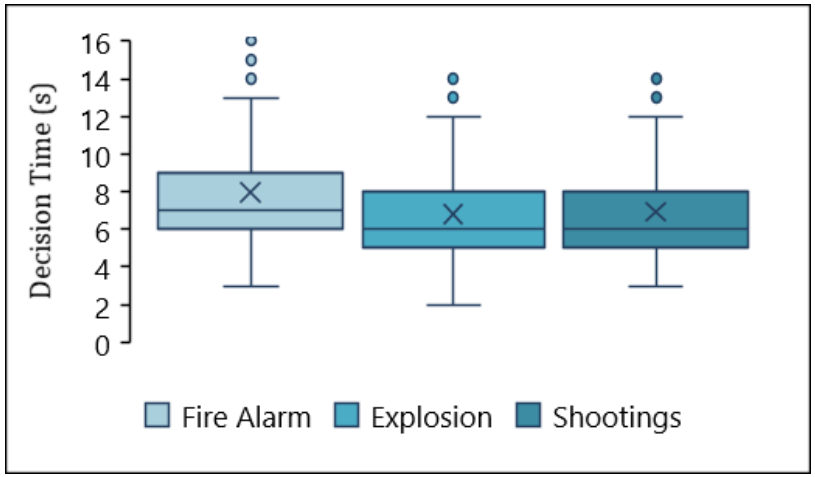




Threat Factor



Decision: χ^2 (2, N = 5421) =254.39, p < .001

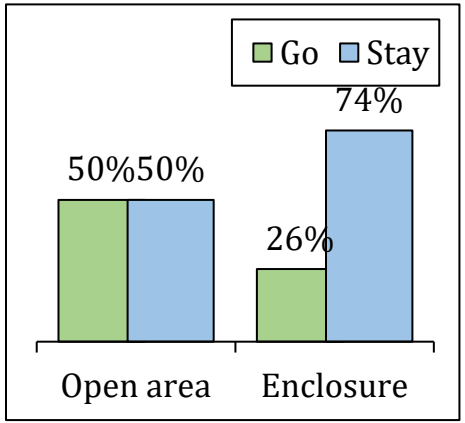


Decision Time: $H(2)$ = 205,8, p < .001

Physical Factor ⟶ Open area vs Enclosure

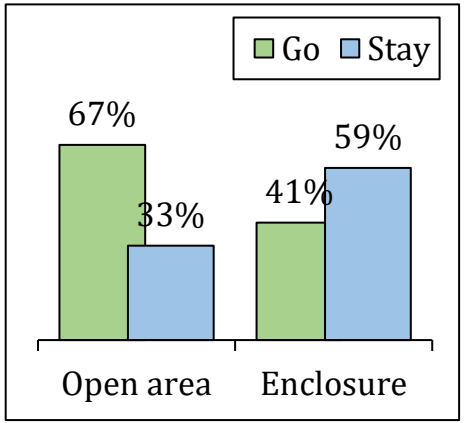
Shootings trials

Individual



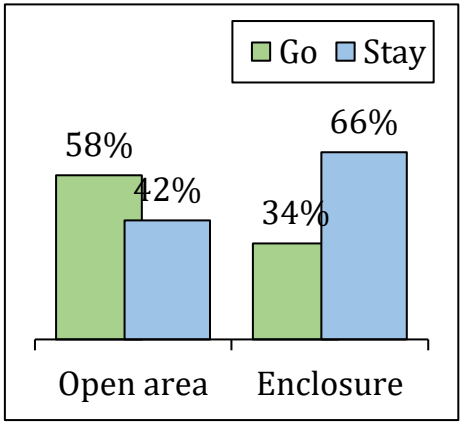
χ^2 (1, N=604)=38.12, p<.001

Group Go



χ^2 (1, N=604)=43.87, p<.001

Group Stay

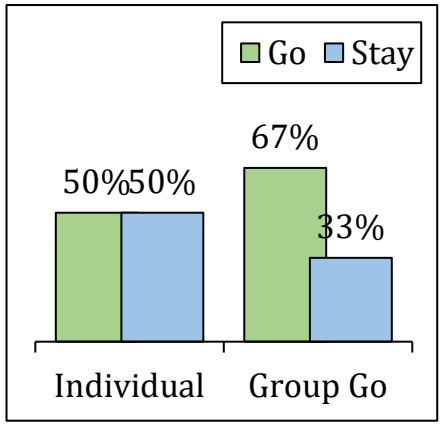


χ^2 (1, N=604)=35.37, p<.001

Social Factor → Individual vs Group Go or Group Stay

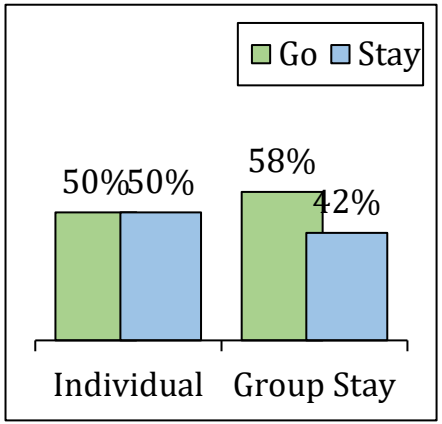
Shootings trials

Open area



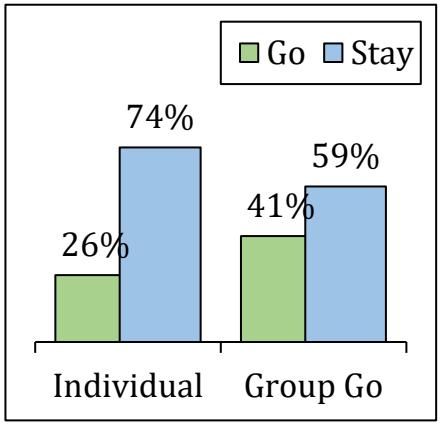
χ^2 (1, N=601)=18.8, p<.001

Open area



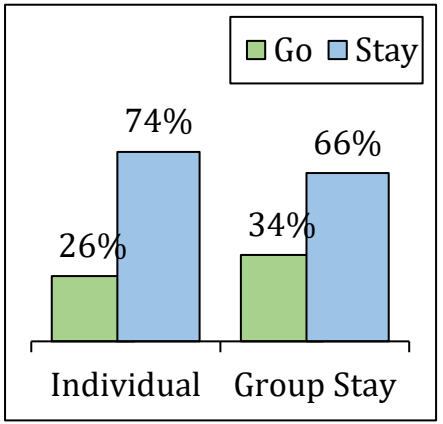
χ^2 (1, N=600)=3.87, p=.049

Enclosure



χ^2 (1, N=602)=15.2, p<.001

Enclosure



χ^2 (1, N=605)=4.99, p=.026

Variable	Decision	Decision time
Gender	○	○
Age	✓	✓
Education level	○	○
Monthly income	✗	✗
Previous Drill	○	✓
Prior Training	✗	✗

✓ Impact

○ Partial Impact

✗ No impact

Should I stay or should I go? → External and internal factors influence decisions

Online experiments → To collect data from evacuation studies and human behaviour

Improve knowledge on self-protective actions → further impact analysis
→ ranking the impact level
→ developing a predictive model

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TAKE PART IN THE EXPERIMENT!

Access the link using this QR

Thank you for your attention!