Detecting bike-lane quality

Rijkswaterstaat

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Problem description

Bike-lane quality $\rightarrow$ improve safety

Volunteered information from cyclists

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Bike-lane quality $\rightarrow$ improve safety

Volunteered information from cyclists

No input while cycling

Minimal effort from cyclist

Overview

Data $\rightsquigarrow$ road quality ?

- Social media
- Bike-fixed device

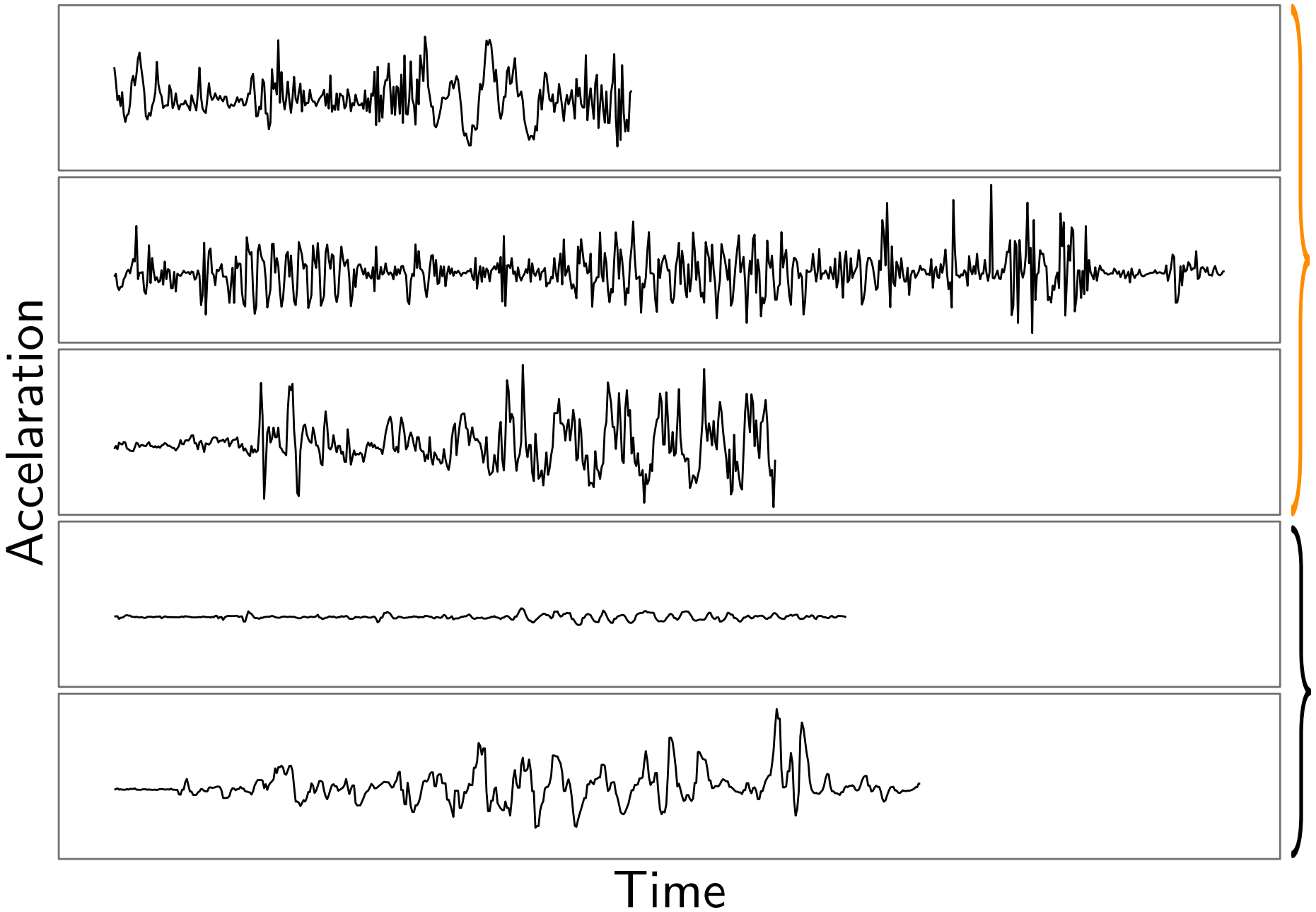
- Smartphone

Gathering data

Phone sensor data

- 2 bikes
- 4 cyclists
- Smooth with damage, sidewalk

Preliminary results



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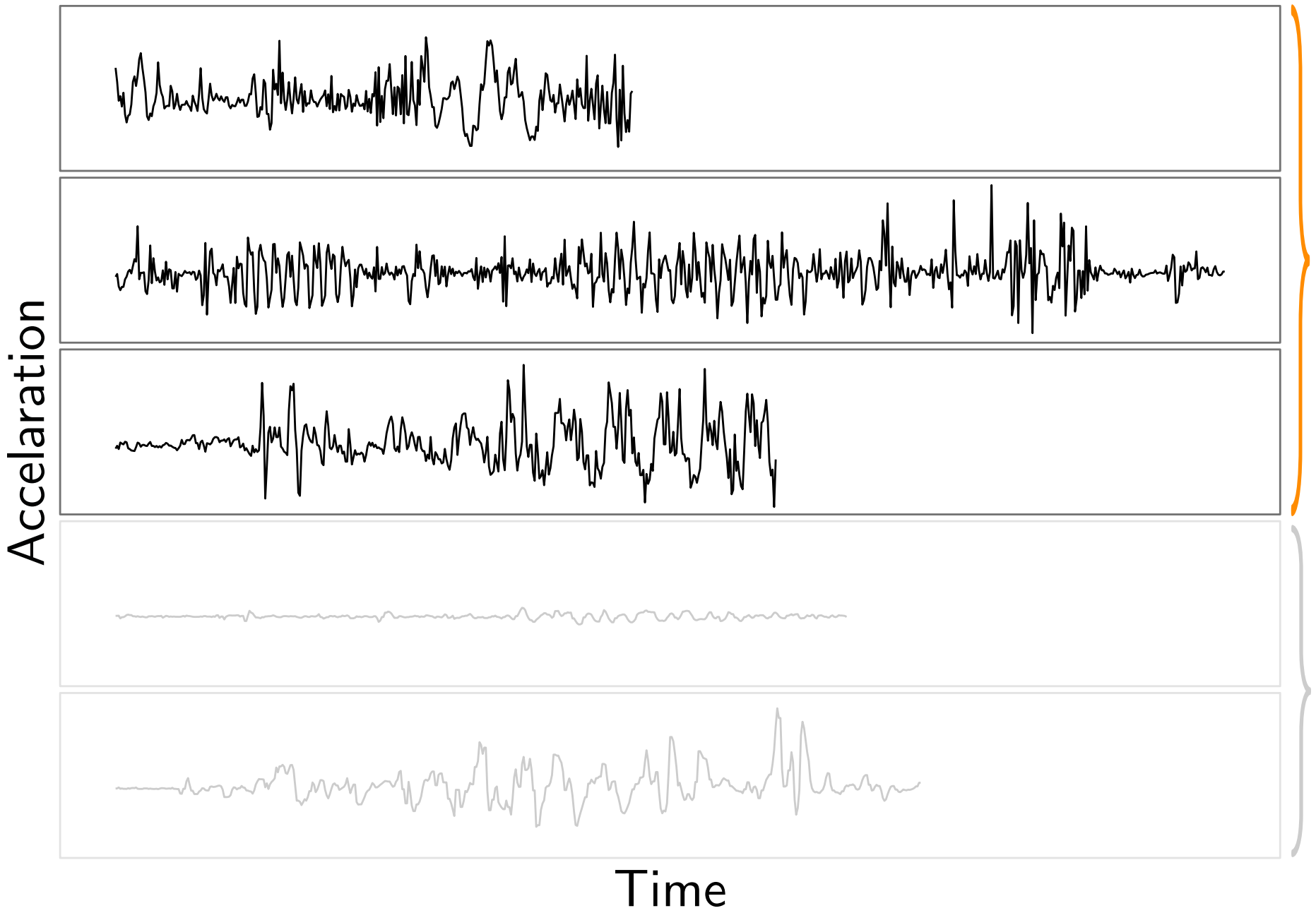

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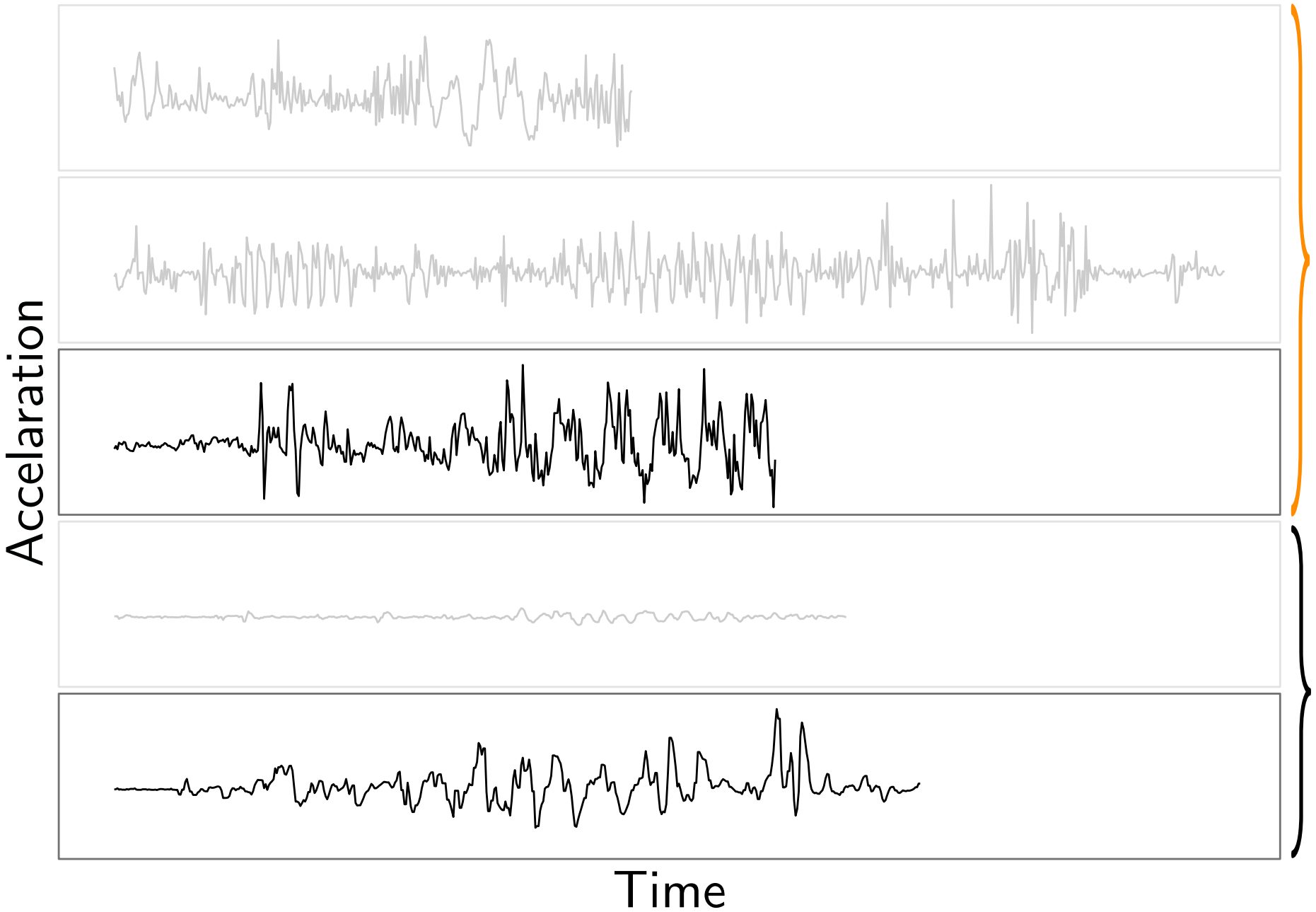

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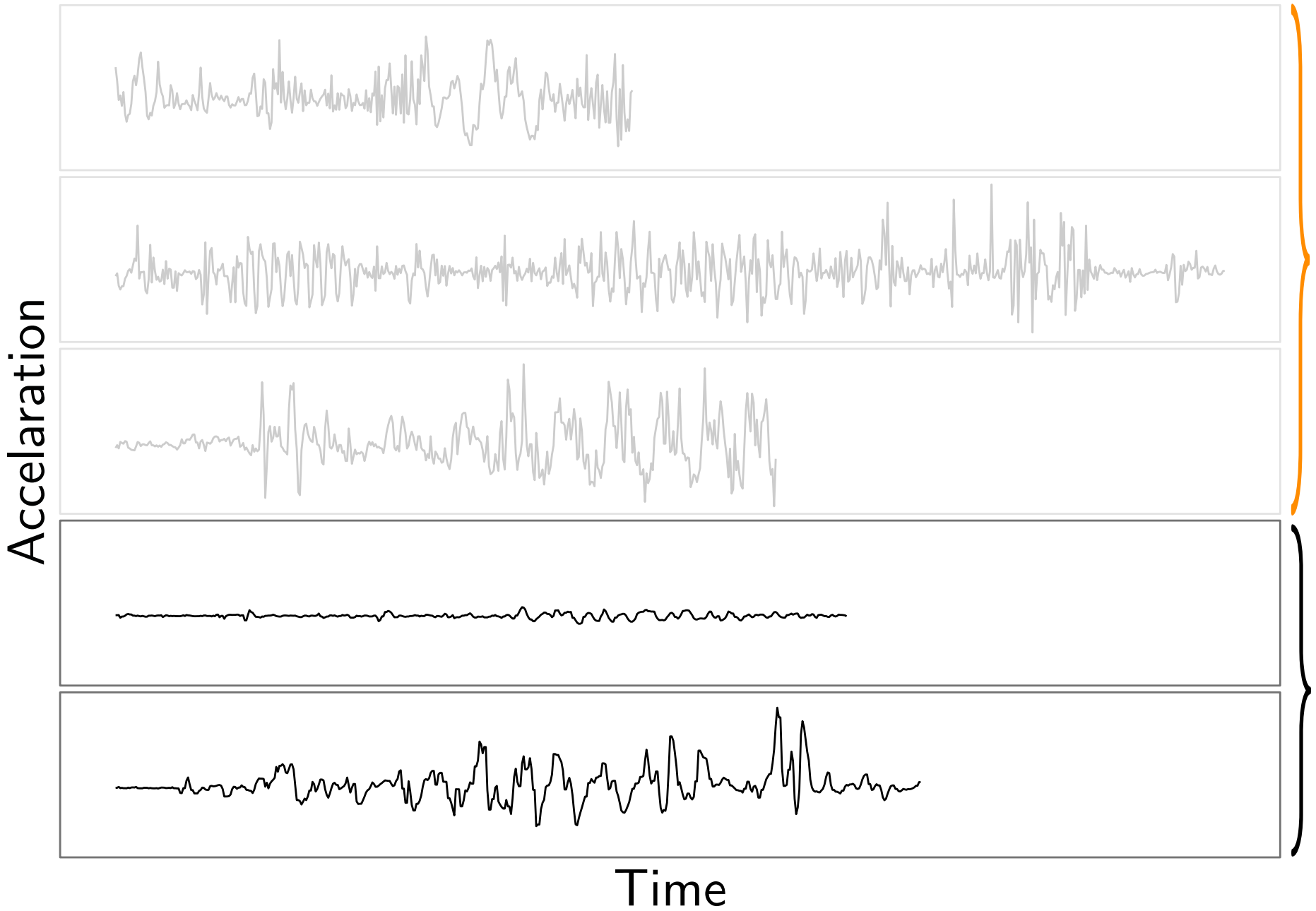
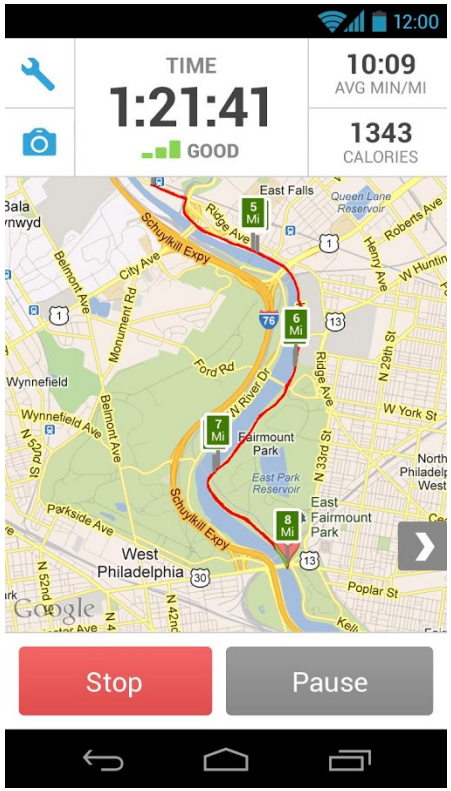


Considerations

Cyclist's interest

Reaching audience



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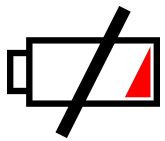
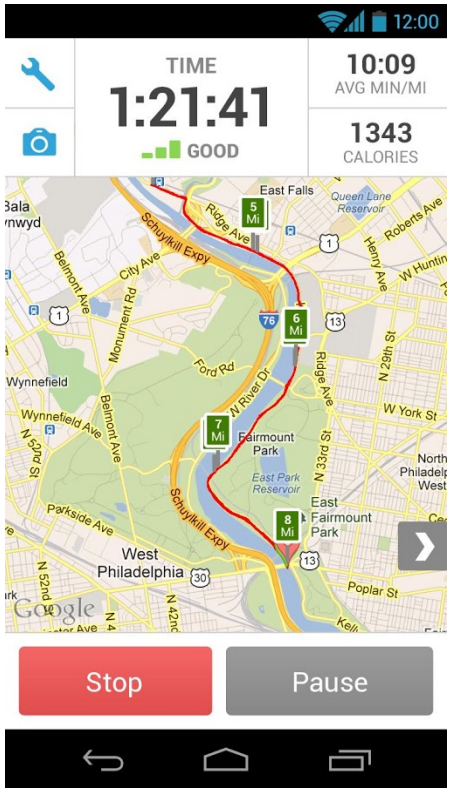
Investment 

Post-riding evaluation



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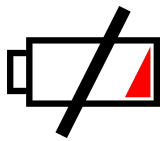
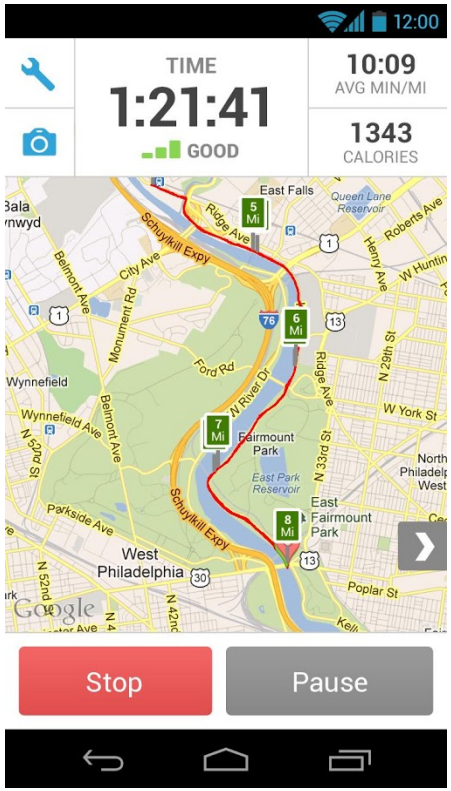
Investment 

Post-riding evaluation

Seasonal effects

Privacy



Outlook

Further analyze data

Identify pitfalls and cyclist's interest

Limited user input

Other quality criteria