Real Time Identifiction in Crowds

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Predator[1]

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Why the TLD approach?

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TLD Approach[2]

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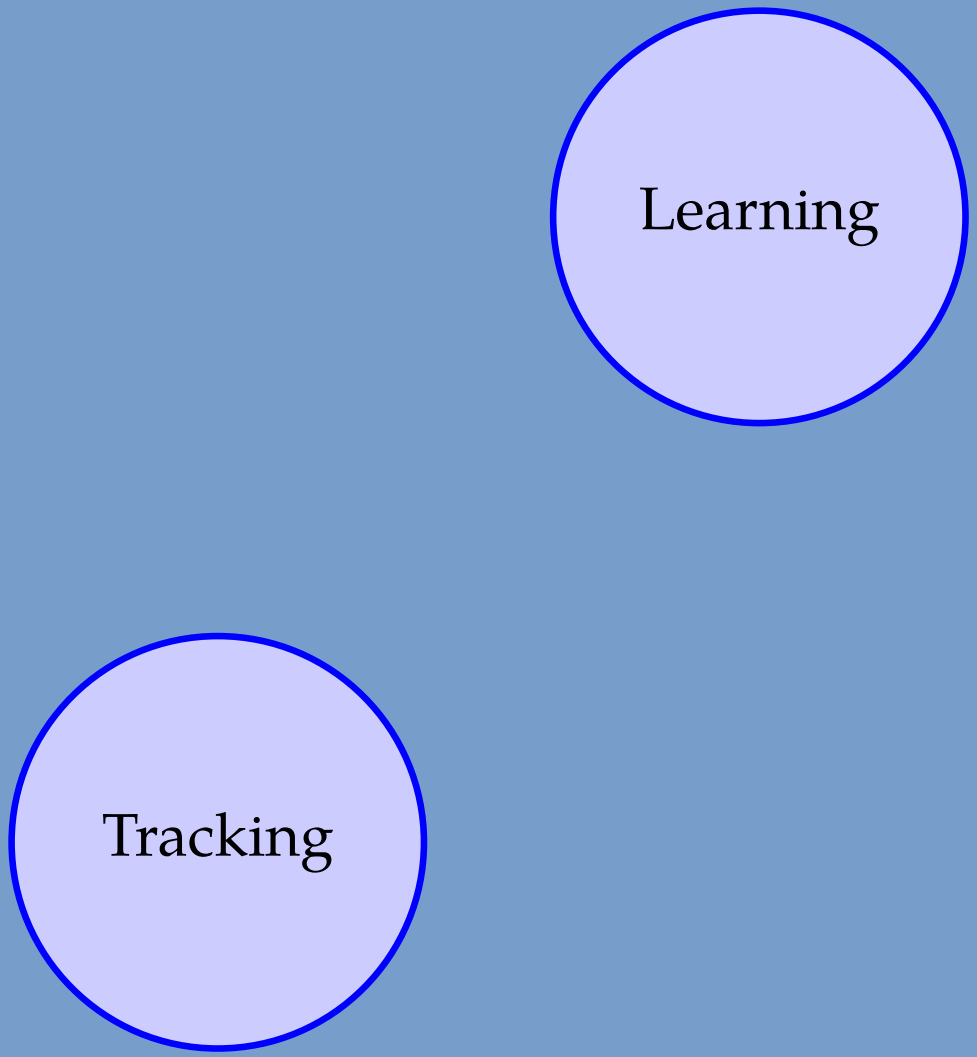

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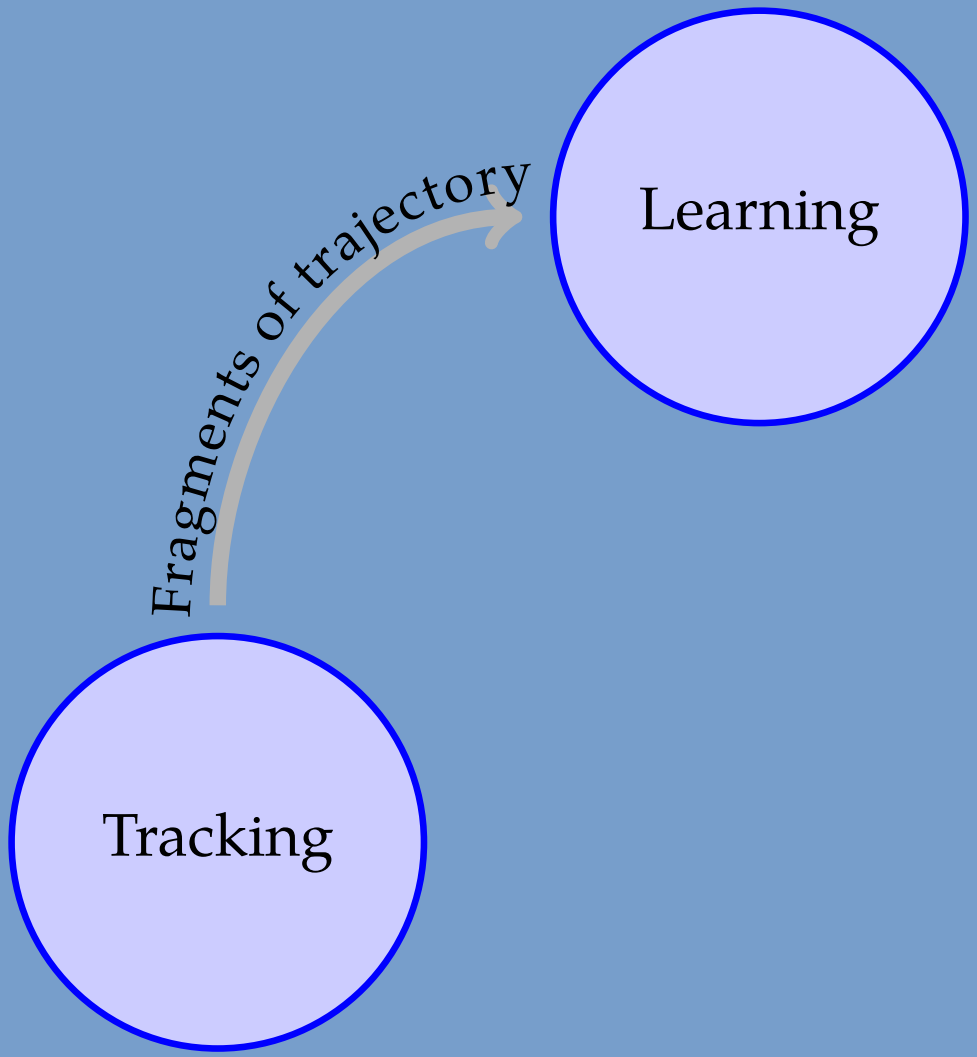

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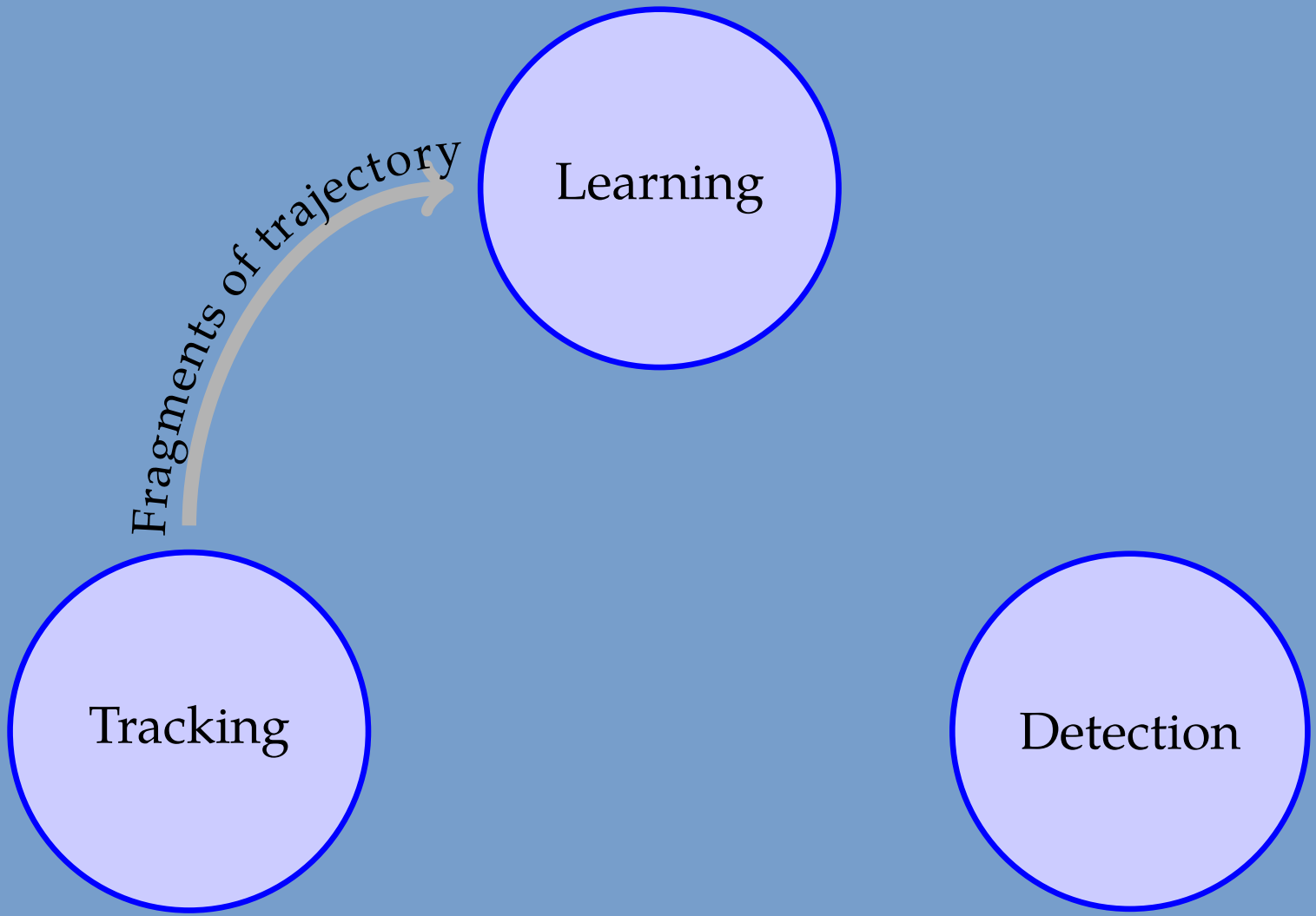

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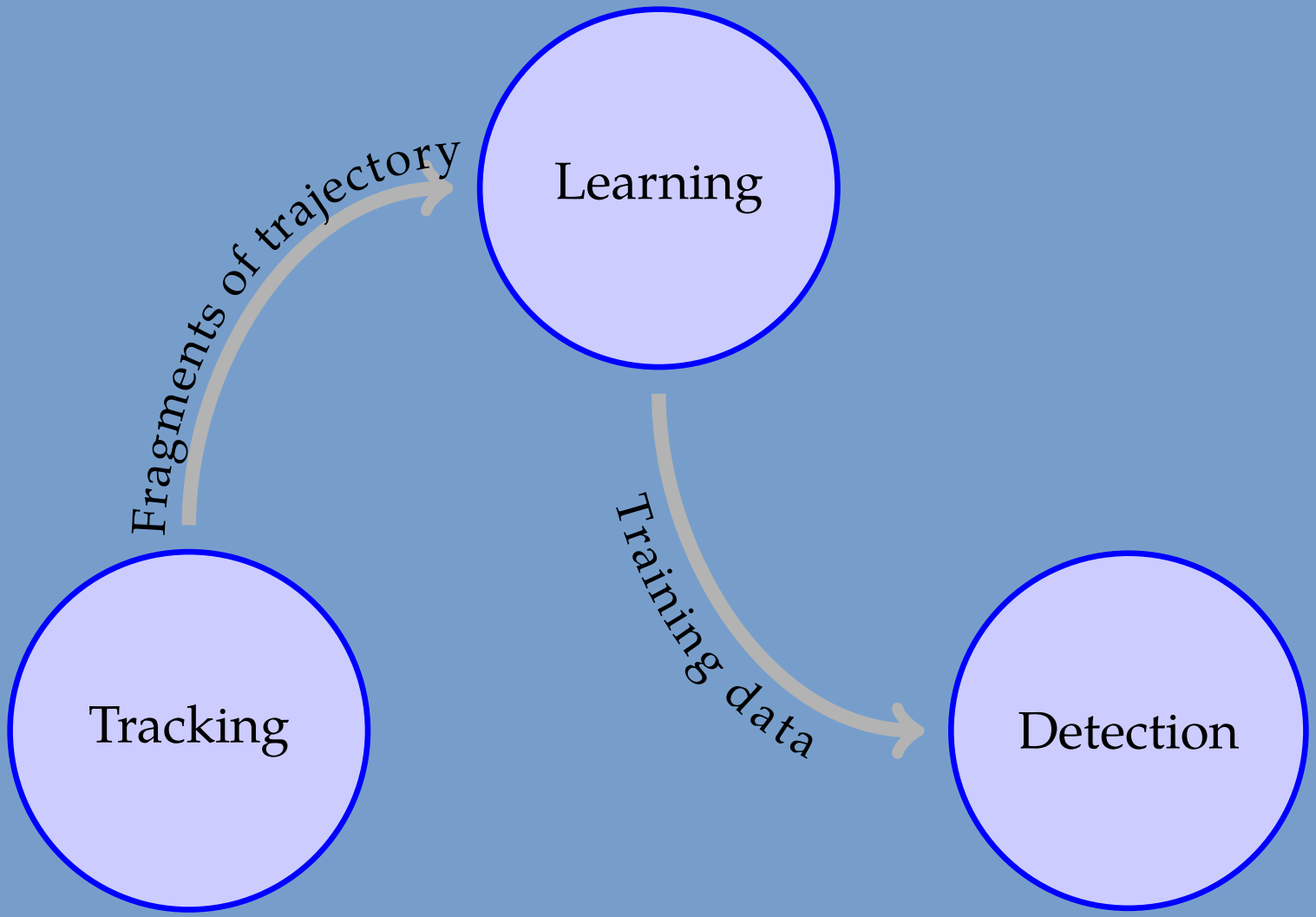

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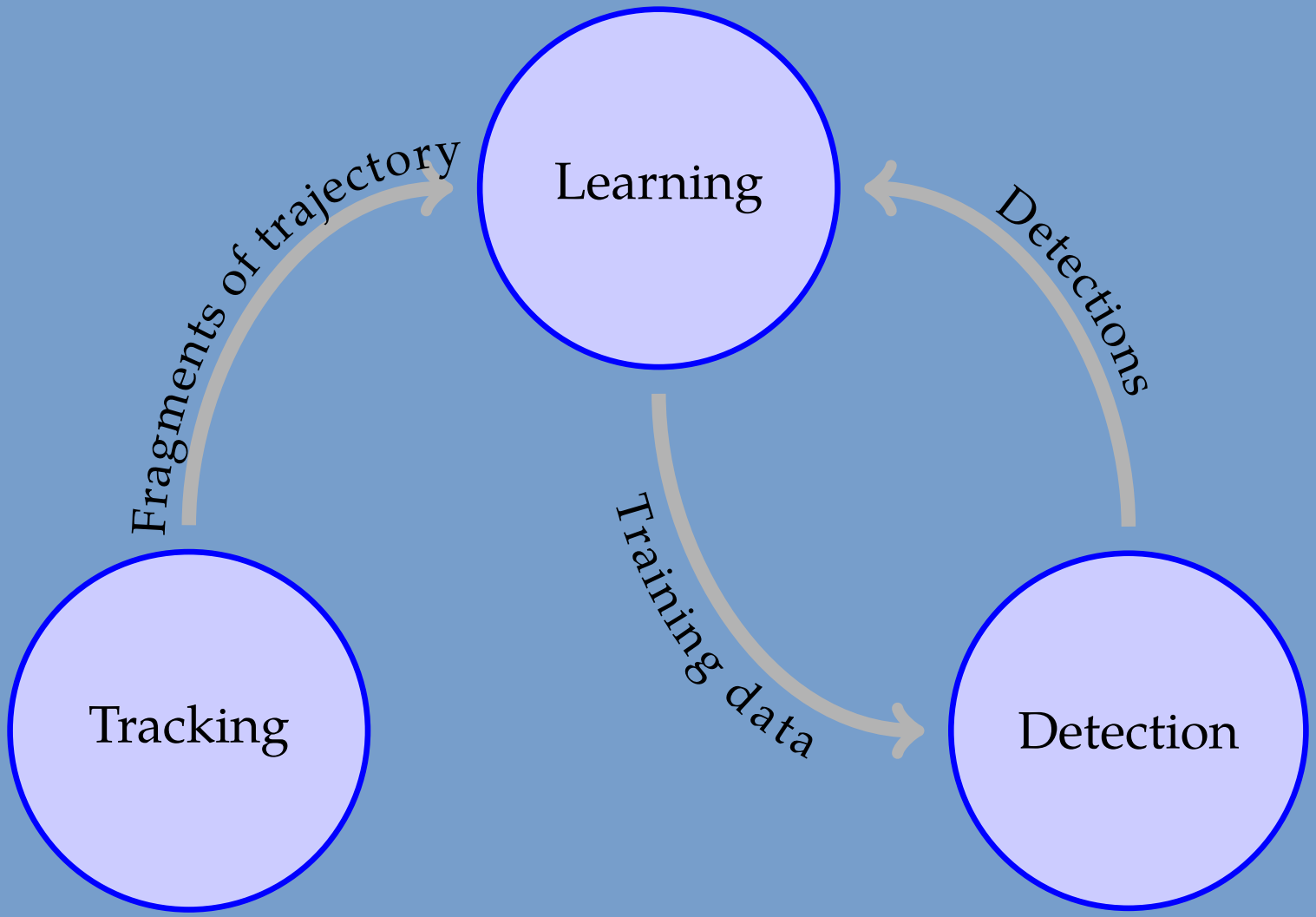

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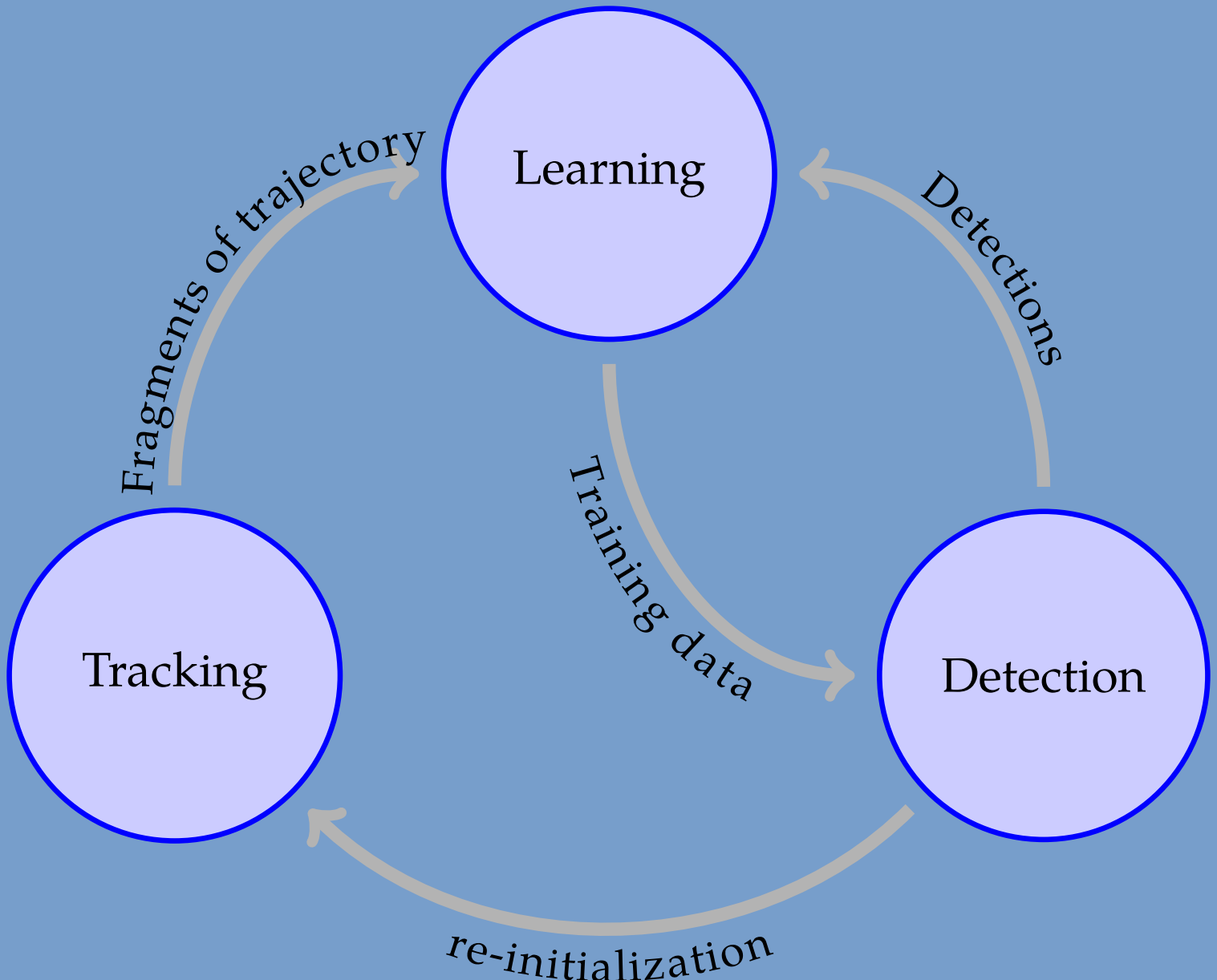

Improvements to Predator

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KCF	HOG [1]	73.2%	172
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TLD		60.8%	28

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[1] Histogram of Oriented Gradients

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- Better Learning Models

[1] Histogram of Oriented Gradients

Further applications

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Class Register?

Assitive technologies?

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  - 3rd week of 2nd term

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- Extension to Multiple Object Tracking
  - Beginning of 4th Term

References

[1] Z. Kalal, "Predator - tracker that learns and improves," Youtube. (2011), [Online]. Available: `https://www.youtube.com/watch?v=1GhNXHCQGsM`.

[2] Z. Kalal, K. Mikolajczyk, and J. Matas, "Tracking-learning-detection," *IEEE transactions on pattern analysis and machine intelligence*, vol. 34, pp. 1409–1422, 7 2011.

[3] J. F. Henriques, R. Caseiro, P. Martins, and J. Batista, "High-speed tracking with kernelized correlation filters," *IEEE transactions on pattern analysis and machine intelligence*, vol. 37, pp. 583–596, 3 2014.