# Siqi Wu

Ann Arbor, MI, USA | siqiwu@umich.edu | https://avalanchesiqi.github.io/

#### **SUMMARY**

I will join the School of Information at the University of Michigan as a research fellow in Fall 2021, working with Prof. Paul Resnick. Prior to UMSI, I was a research fellow at the Australian National University. My work lies in the fields of computational social science and social computing.

#### PROFESSIONAL EXPERIENCE

# Research Consultant | University of Michigan. Remote - Center for Social Media Responsibility. Adviser: Paul Resnick. Research Fellow | Australian National University. Canberra, ACT, Australia 2020.09 - present 2020.09 - present

- Computational Media Lab. Adviser: Lexing Xie.

# **EDUCATION**

# Australian National University. Canberra, ACT, Australia

2016.06 - 2020.09

- PhD in Computer Science. Advisers: Lexing Xie and Marian-Andrei Rizoiu.
- Thesis: Measuring collective attention in online content: Sampling, engagement, and network effects

## University of Melbourne. Melbourne, VIC, Australia

2013.07 - 2015.07

- Master of Information Technology. Adviser: Richard Sinnott.
- Thesis: An architecture for big data processing and visualisation of traffic data

### Tianjin University. Tianjin, China

2008.09 - 2012.06

- Bachelor of Electronics Engineering. Adviser: Yugong Wu.

#### **PUBLICATIONS**

- 9. Cross-partisan discussions on YouTube: Conservatives talk to liberals but liberals don't talk to conservatives
  - Wu and Resnick. ICWSM '21. Full paper, best paper finalist.
- 8. AttentionFlow: Visualising influence in networks of time series Shin\*, Tran\*, **Wu**\*, Mathews, Wang, Lyall, and Xie. *WSDM* '21. Demo.
- 7. Unsupervised cyberbullying detection via time-informed Gaussian mixture model Cheng, Shu, **Wu**, Silva, Hall, and Liu. *CIKM* '20. Full paper.
- 6. Variation across scales: Measurement fidelity under Twitter data sampling **Wu**, Rizoiu, and Xie. *ICWSM* '20. Full paper.
- 5. Estimating attention flow in online video networks
  - Wu, Rizoiu, and Xie. CSCW '19. Full paper, best paper honorable mention.
- 4. How is attention allocated? Data-driven studies of popularity and engagement in online videos **Wu**. *WSDM '19*. Doctoral consortium.
- 3. Beyond views: Measuring and predicting engagement in online videos **Wu**, Rizoiu, and Xie. *ICWSM* '18. Full paper.

- 2. Will this video go viral? Explaining and predicting the popularity of YouTube videos Kong, Rizoiu, **Wu**, and Xie. WWW '18. Demo.
- 1. SMASH: A cloud-based architecture for big data processing and visualization of traffic data **Wu**, Morandini, Sinnott. *DSDIS* '15. Full paper.

#### INDUSTRY EXPERIENCE

# Software Engineer | MicroStrategy, Inc. Hangzhou, Zhejiang, China

2015.09 - 2016.05

- Big Data Engine team. Built Apache Spark alike engine to process massive data.

# Software Developer Intern | Baidu, Inc. Beijing, China

2014.12 - 2015.02

- Baidu Maps team. Developed a tool to collect realtime traffic status.

#### **AWARDS**

- AAAI ICWSM Best Paper Finalist '21
- ANU Postgraduate Research Scholarship '20
- ANU VC Travel Grant '20
- ACM CSCW Best Paper Honorable Mention '19
- Google PhD Fellowship '18
- ICWSM Student Travel Scholarship '18
- NICTA PhD Scholarship '16-'19
- NICTA Research Project Award '16-'19
- ANU HDR Fee Remission Merit Scholarship '16-'20

#### **TEACHING**

- Teaching assistant in ANU graduate course COMP6490 Document analysis ('17, '18).
- Teaching assistant in ANU undergraduate course COMP1030 Art of computing ('17).

#### **COMMUNITY SERVICE**

- Senior program committee: ICWSM ('22)
- Program committee/Reviewer: ICWSM ('17, '18, '21), CSCW ('19-'22), WWW ('19, '20), AAAI ('19), ACM TOIS ('20), EPJ Data Science ('21), ASONAM ('21)

#### **RESOURCES**

- Datasets: <u>YouTube political discussions</u>, <u>Complete/sampled retweet cascades</u>, <u>Vevo music graph</u>, <u>YouTube engagement '16</u>.
- Demonstrations: AttentionFlow, HIPie.
- Softwares: Twitter-intact-stream, YouTube-insight.

#### MISC.

- Organizing: co-organized the Computational Media Lab winter workshop '19.
- Certificates: 16 MOOC courses, e.g., machine learning, social network analysis, algorithms, etc.
- Running: 18 100+km events, 50+ (ultra) marathons finisher, 2:57 marathon.