

— —  
+

# MEDIA & THE PUBLIC

## Week 2 Communication mediation model

Ryan Wang  
ryanyang@psu.edu

—



+

# BACKGROUND





# Communication mediation model

+

- Theoretical contribution:
  - A framework to clarify the effects of communication practices (e.g., news consumption, and interpersonal discussion) on civic and political engagement
- Methodological contribution: mediation analysis
- Finding:
  - the informational use of media stimulates citizen discussion and expression, which in turn boosts civic and political participation
- Origins
  - Habermas (1989);
  - Trade: Media → Conversation → Opinion → Action

+



# O-S-R-O-R Framework (Cho et al., 2008)

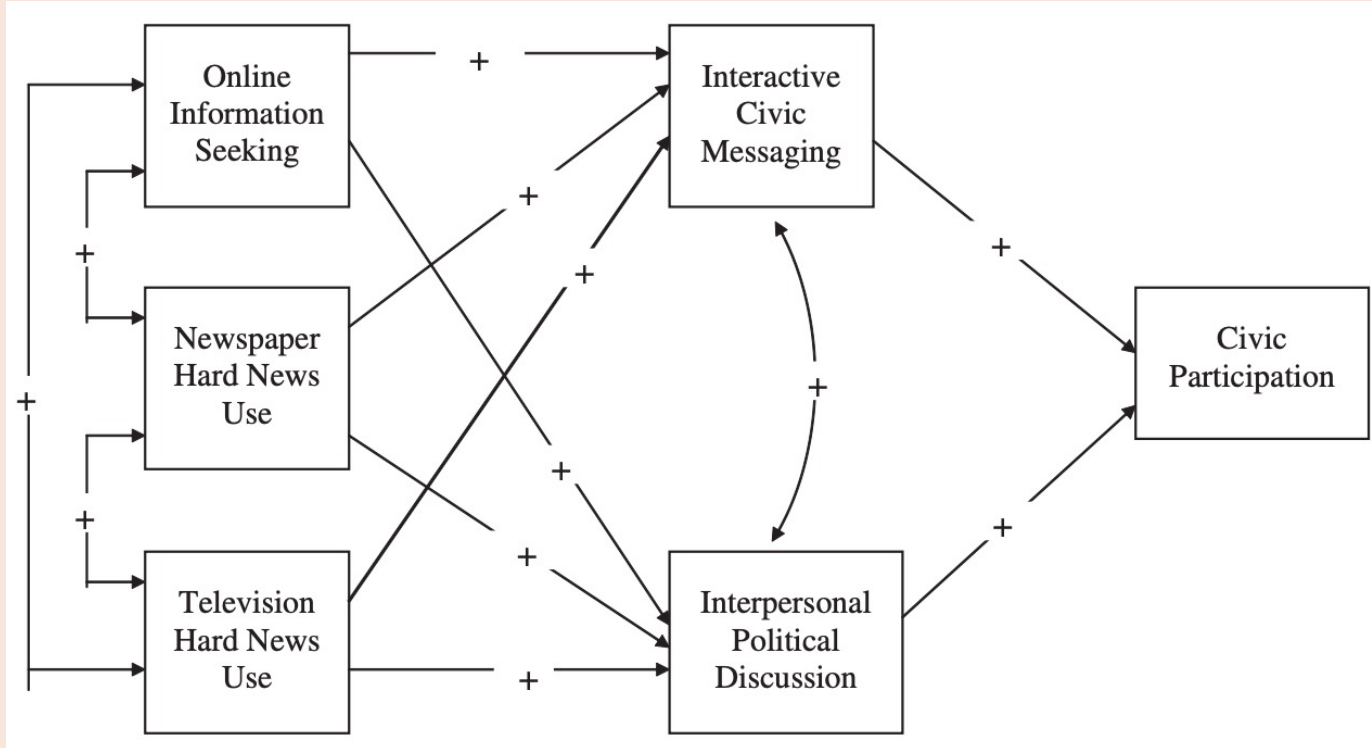
+

- O-S-O-R model & O-S-R-O-R model
  - Orientation (1): pre-exposure orientation
    - Ideology, world views, personal values, psychological predispositions, perceptions of social institutions and other demographic factors.
  - Stimulus: media messages
  - *Reasoning*.
    - Psychological variables thought to further mediate the relationship between interpersonal discussion and participation (e.g., knowledge, reflection, efficacy, and complexity (Cognitive mediation model, Eveland, 2001)
  - Orientation (2): post-exposure orientation
    - The set of orientations and audience reaction subsequent to media exposure (various ways audiences may deal with media messages)
  - Response: subsequent behavioral outcome
- Other domains:
  - Consumption of entertainment media content
  - Exposure to public health campaigns

+

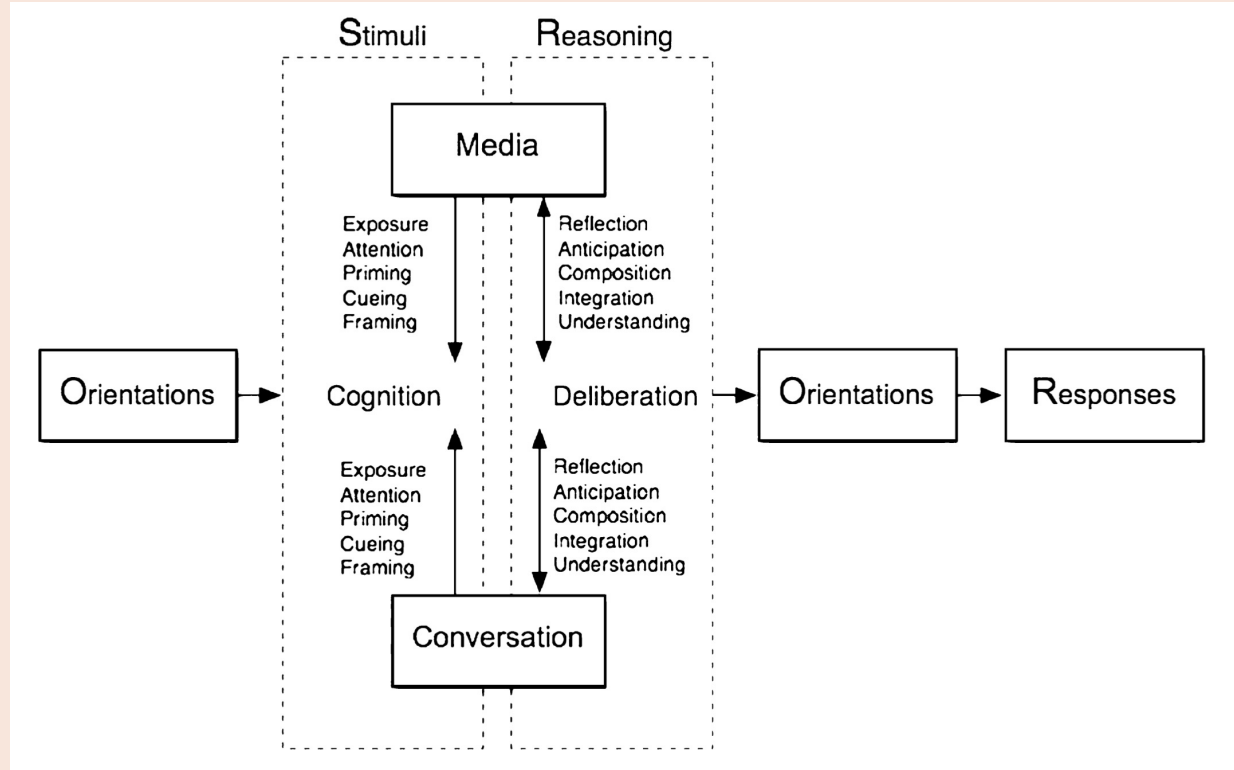


# Citizen communication mediation model (Shah et al., 2005)





# Campaign communication mediation model (Shah et al., 2007)



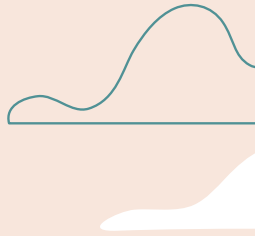
+

# WHAT IS SEM?





# What is the Structural equation modeling?



+

- Regression analysis
  - It uses information from a variable or a set of variables (multiple regression) to predict the value of another variable
  - The predictors provide information about *what* the expected value of the outcome is, but do not give any information about *why* or *how*.
- Path analysis (causality)
  - An extension of regression analysis with several joint models
  - The *how* question(s): built on hypotheses – explanation
- Factor analysis
  - The measurement model
- Some advantages:
  - Allow for multiple dependent variables
  - Account for measurement errors
  - Imply causality and good for testing theory

+





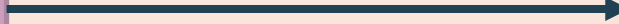
# What is mediation?

+

*Independent variables*

*Dependent variable*

Major  
Aptitude  
Motivation



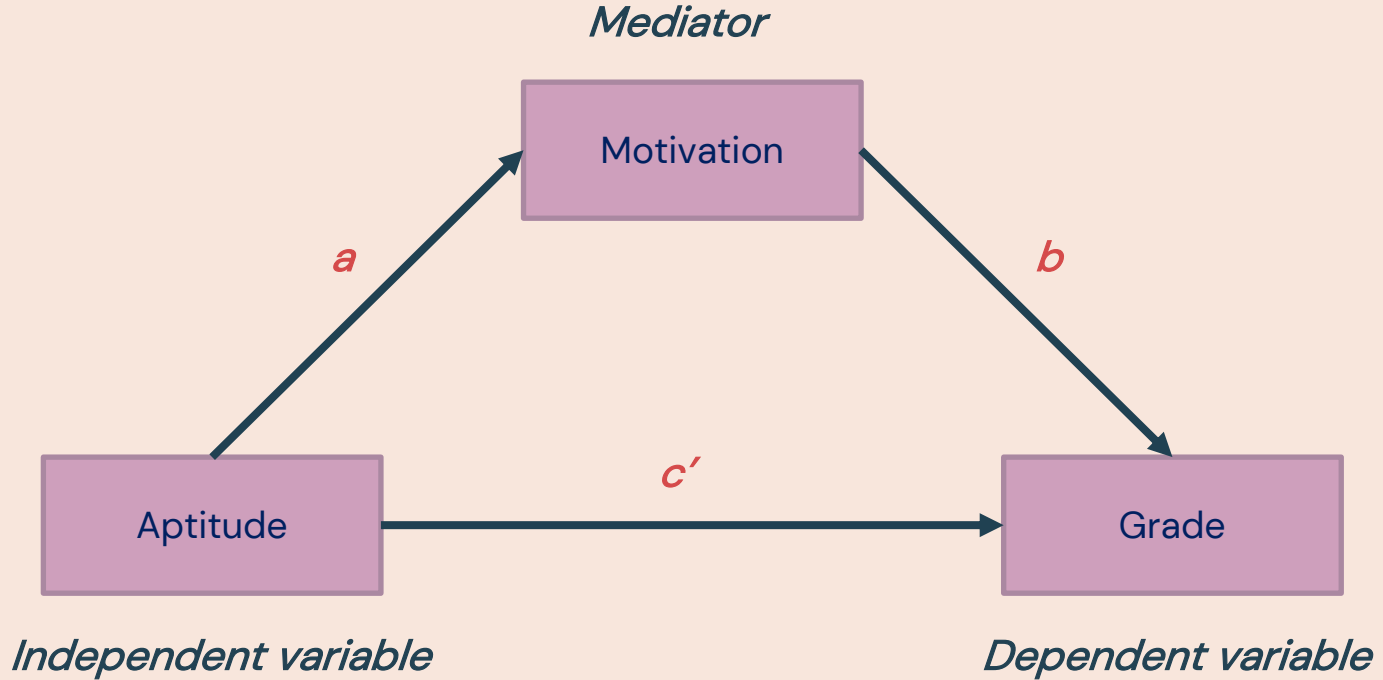
*c*

Grade

+

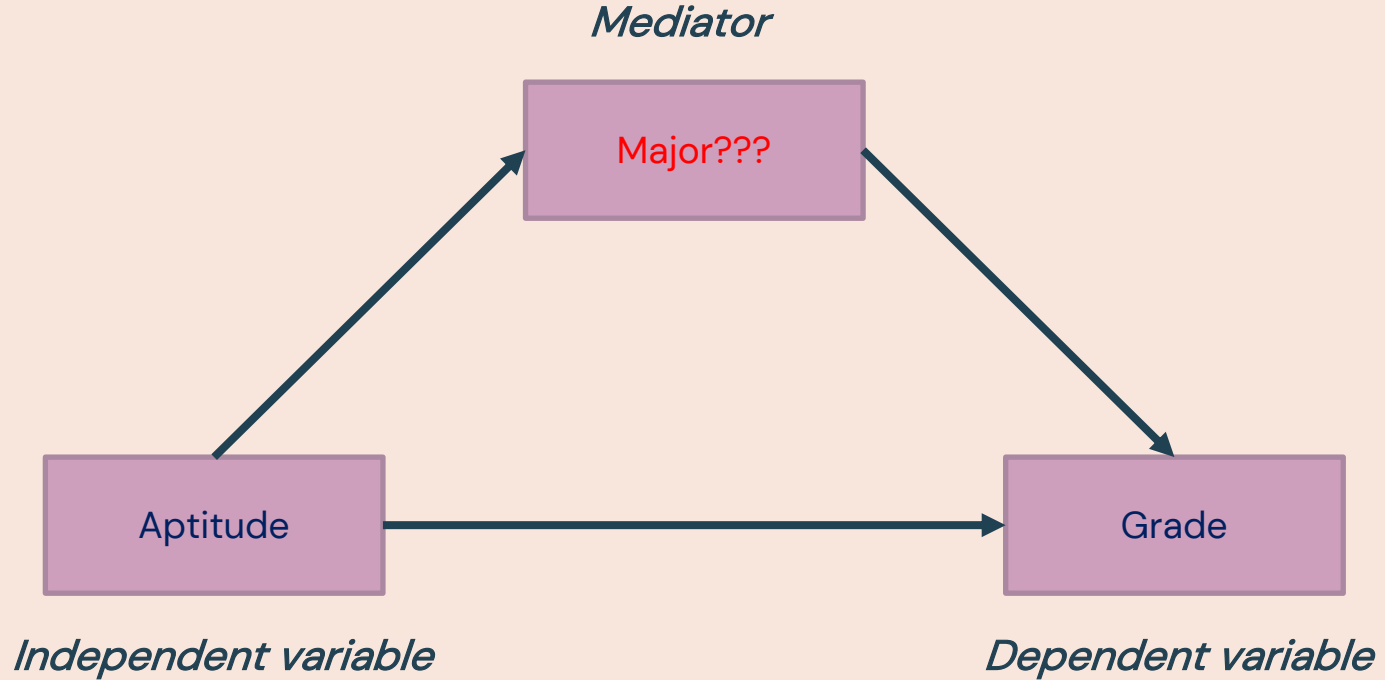


# What is mediation?





# What is mediation?





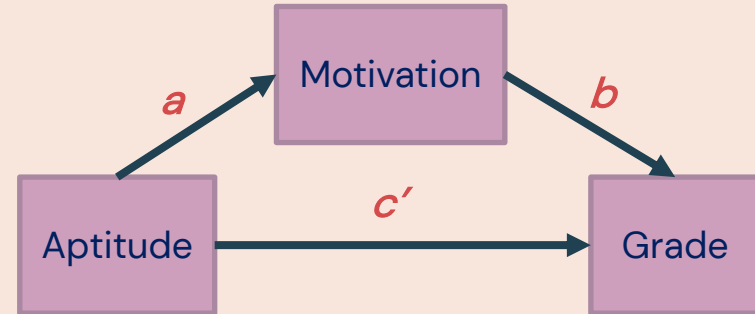
# What is mediation?

+

Path c: a bivariate regression predicting DV from IV

Path a: a bivariate regression predicting mediator from IV

Path b & c': multiple regression predicting DV from mediator & IV



Indirect effect =  $a \cdot b$

Direct effect =  $c'$

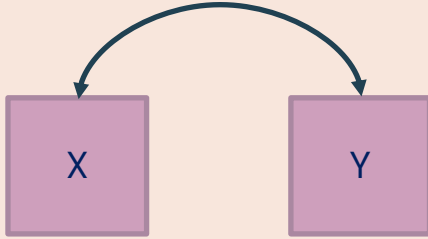
Partial mediation: if IV has both direct and indirect effect on DV

Full mediation: if IV has only indirect effect on DV

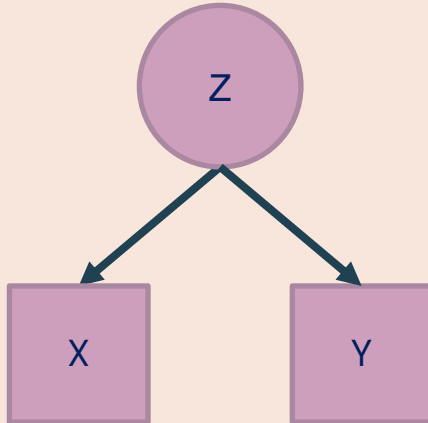


# What is factor analysis?

+



A correlation between variable X and Y

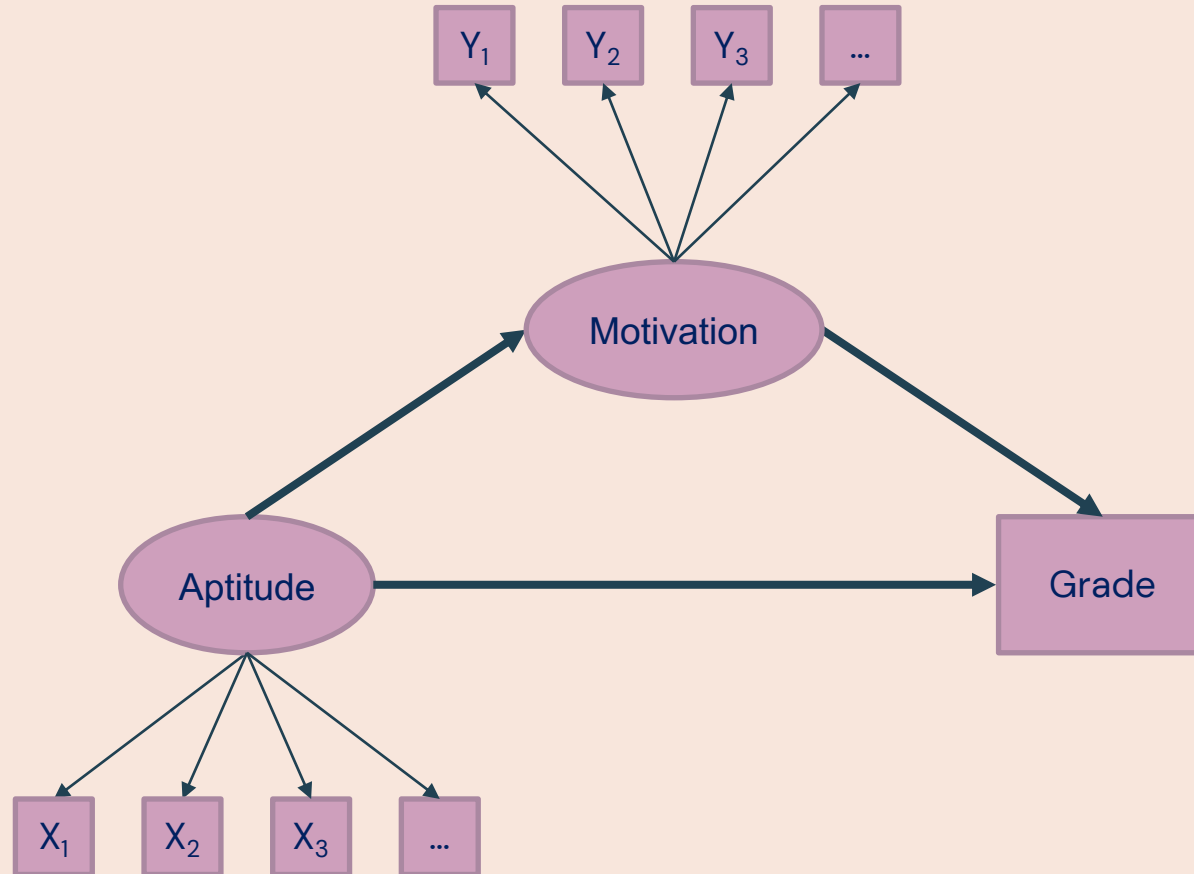


A hidden, unobserved (latent) variable cause the correlation – a factor

+

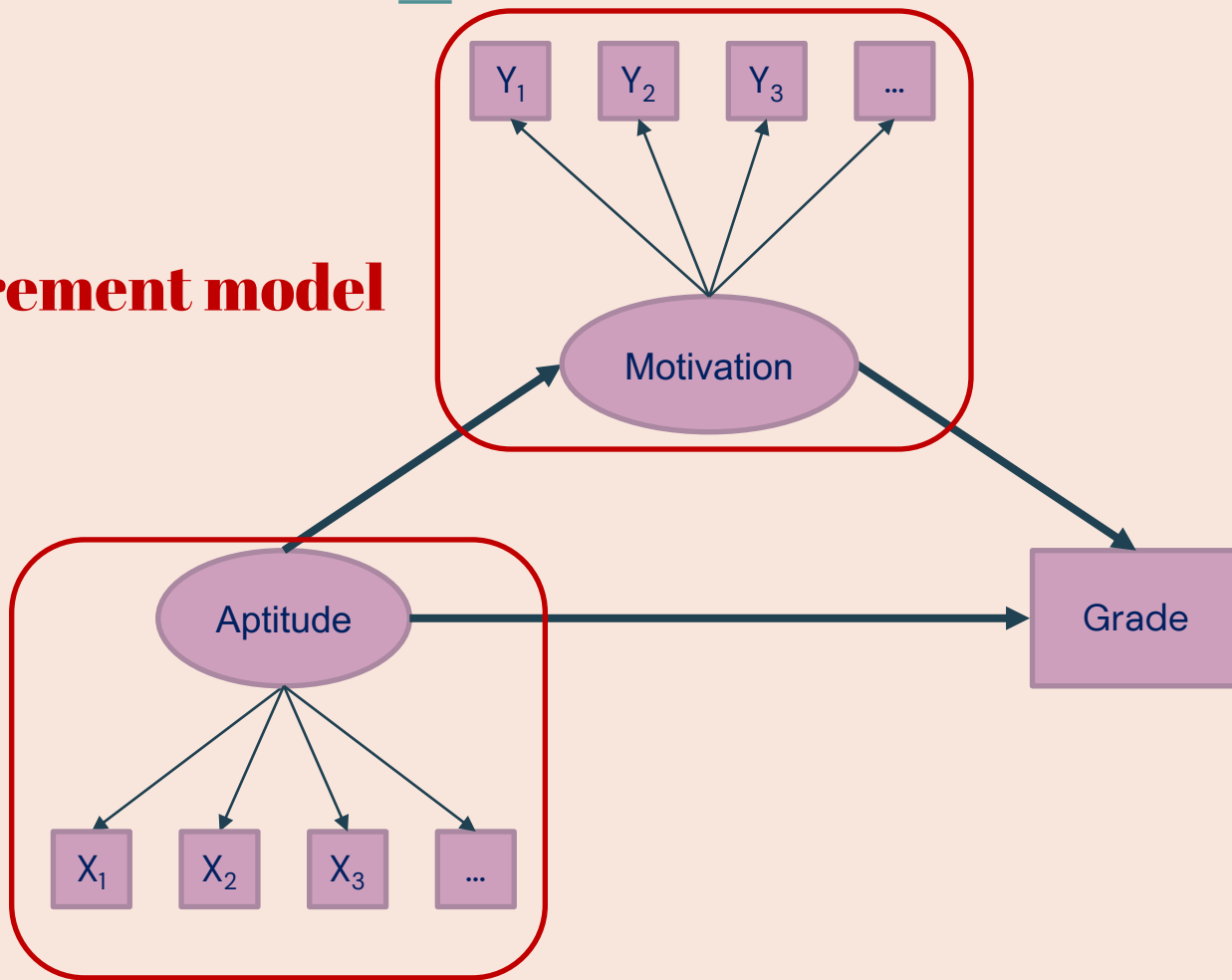


# What is structural equation model (model fit)?

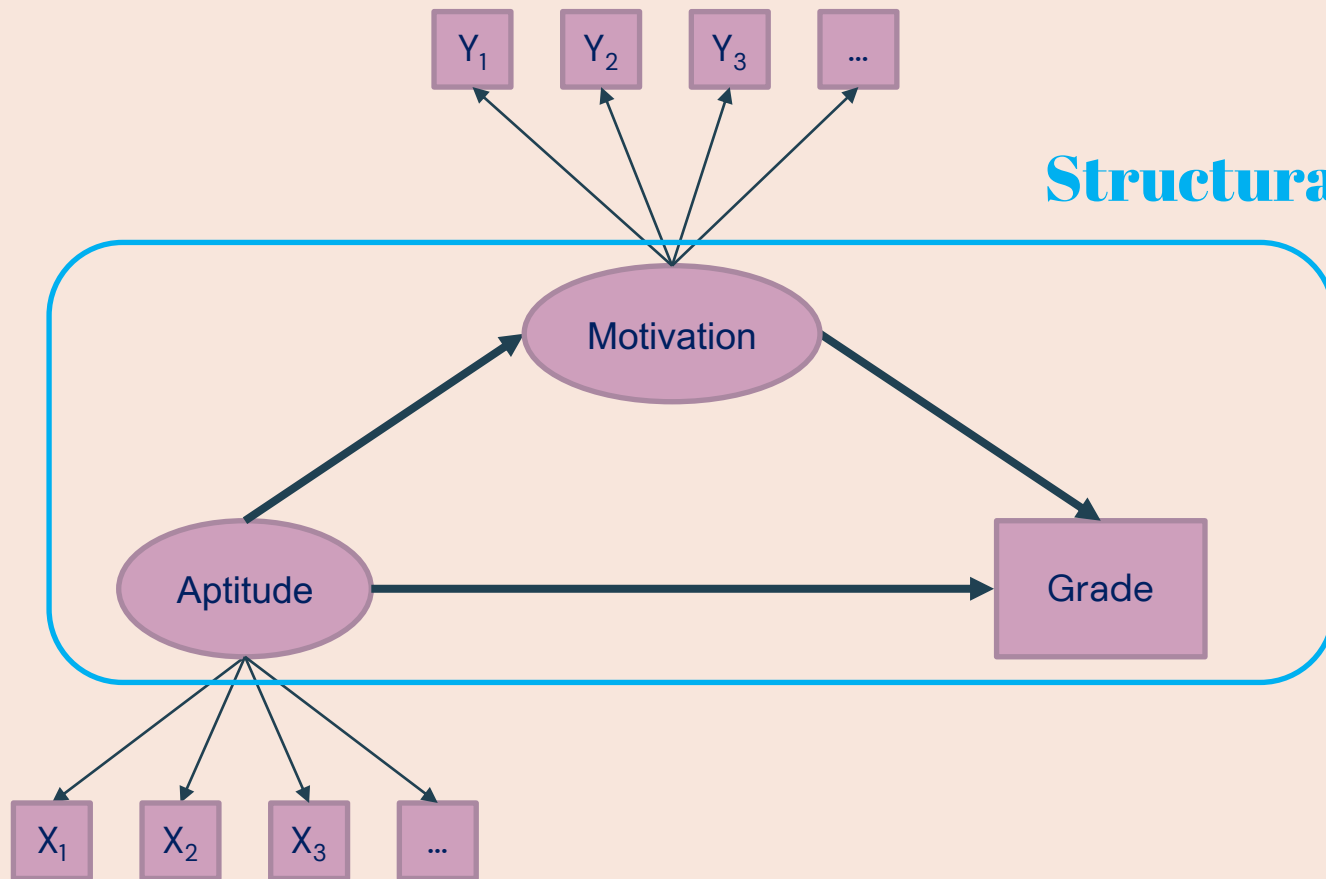


+

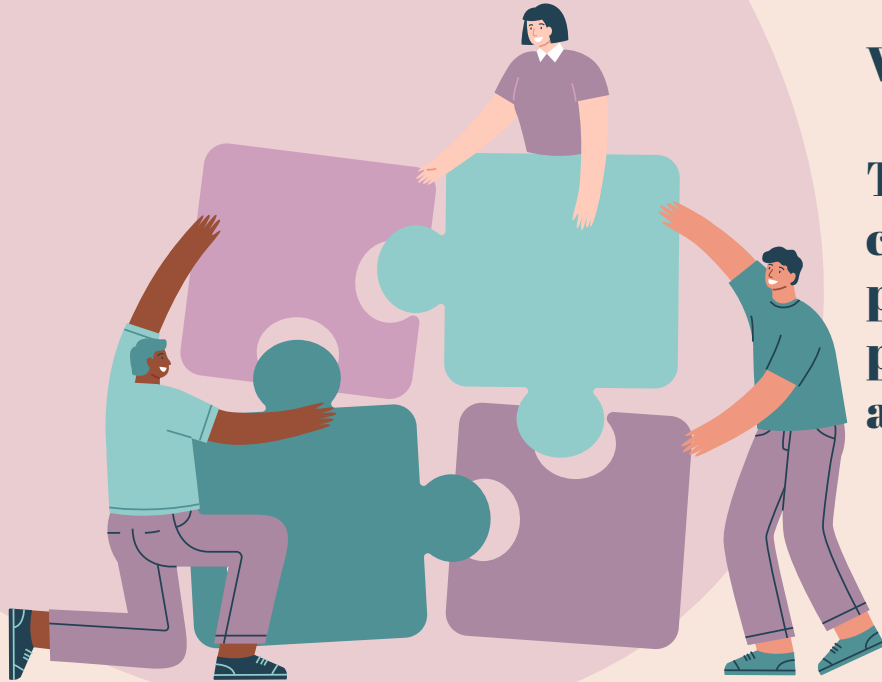
## Measurement model



# Structural model







**Waeterloos, Walrave & Ponnet (2021):**

**The role of multi-platform news consumption in explaining civic participation during the COVID-19 pandemic: A communication mediation approach**

# DON'T TRY TO READ EVERYTHING!



WHAT IS THE MAIN POINT OF THIS PAPER?

- Dependent variable
- Independent variable(s)



WHAT DATA ARE THEY USING?

- Measurement
- Operationalization



WHAT IS THE MAIN RESULT?

- The relationship between IV(s) and DV



WHAT METHOD DO THEY USE?

- How to they get to the result?



# What are the main points of this paper?

+

- Dependent variable
- Independent variable
- Mediators

+



# What are the main points of this paper?

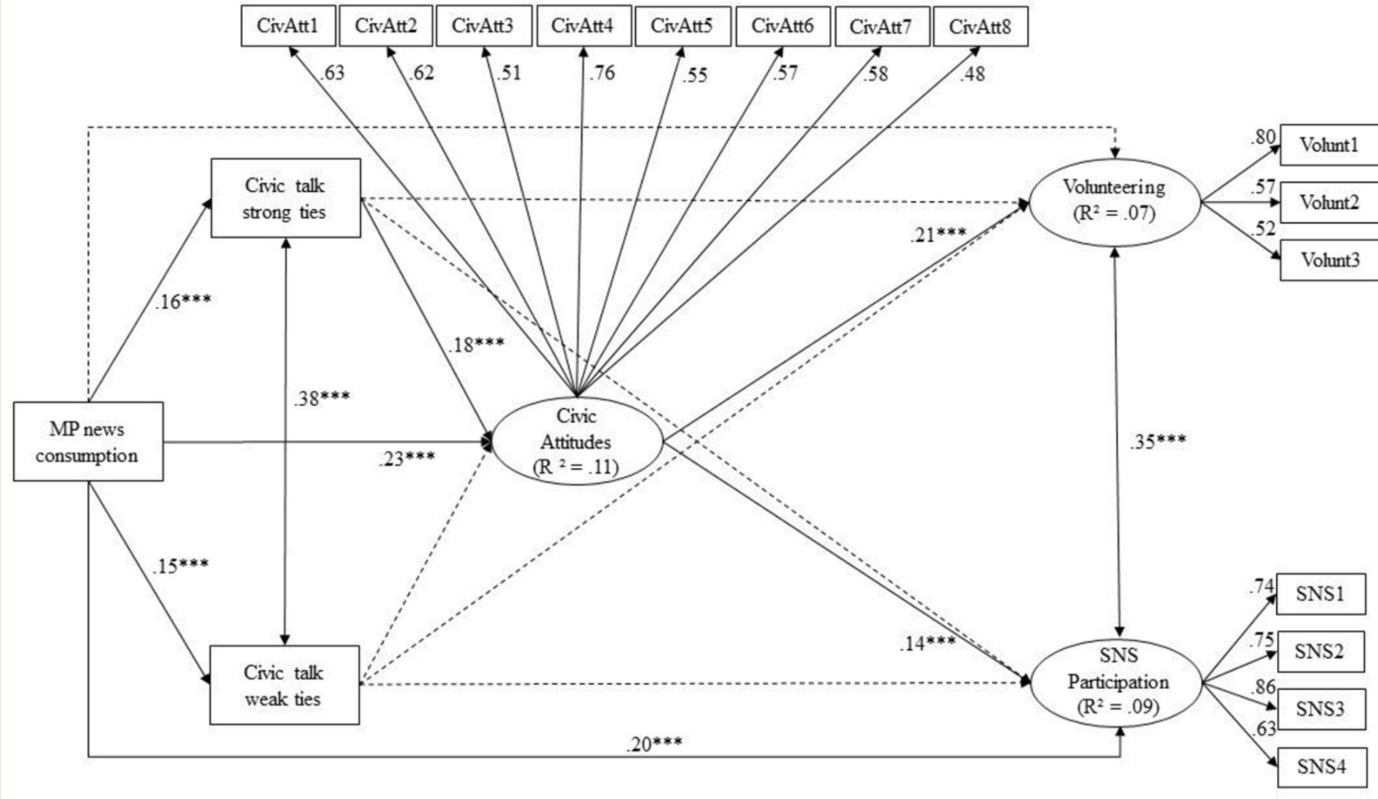
+

- Dependent variable
  - SNS participation
  - Volunteering
- Independent variable
  - Multiplatform news consumption: the habit of paying regular attention to, or relying on, more than one information and communication technology modality for the consumption of news and public affairs information (newspaper and news app)
- Mediators
  - Civic talks
    - Strong ties
    - Weak ties
  - Civic attitude: a sense of civic responsibility or duty

+



# What are the main results (model fit)





# What are the main results

	Std. estimate	SE
<b>Multi-platform news consumption to volunteering</b>		
<b>Total indirect</b>	.062***	.013
MP news consumption → civic talk ST → volunteering	-.007	.005
MP news consumption → civic talk WT → volunteering	.013	.006
MP news consumption → civic attitudes → volunteering	.048***	.010
MP news consumption → civic talk ST → civic attitudes → volunteering	.006**	.002
MP news consumption → civic talk WT → civic attitudes → volunteering	.002	.001
<b>Multi-platform news consumption to SNS participation</b>		
<b>Total indirect</b>	.046***	.010
MP news consumption → civic talk ST → SNS participation	.007	.005
MP news consumption → civic talk WT → SNS participation	.002	.005
MP news consumption → civic attitudes → SNS participation	.032***	.009
MP news consumption → civic talk ST → civic attitudes → SNS participation	.004**	.001
MP news consumption → civic talk WT → civic attitudes → SNS participation	.001	.001

Note. SE: Standard error; SNS: social networking sites; MP: multi-platform; ST: strong ties; WT: weak ties.  
\*\* $p < .01$ , \*\*\* $p < .001$ .



# What are the main results

+

- Mechanism
  - By consuming (multi-platform) news and having civic conversations, people might come across calls to action and are made aware of certain issues, which possibly triggers their sense of civic duty, which eventually lead to their political participation as volunteering and social networking sites participation.
- Explanation for some other findings:
  - Direct relationship between news consumption and SNS participation
  - Weak-tie communication is not working in this context
- Limitations: data; temporal validity

+



## What are the main results

+

Waeterloos, C., Walrave, M., & Ponnet, K. (2021). The role of multi-platform news consumption in explaining civic participation during the COVID-19 pandemic: A communication mediation approach. *New Media & Society*, <https://doi.org/10.1177/14614448211058701>.

Utilizing the O-S-R-O-R framework, Waeterloos et al. find the positive relationship between multi-platform news consumption and non-institutionalized civic participation (i.e., volunteering and social networking site participation) during the COVID-19 pandemic in Belgium, which is mediated by civic talk and civic attitude. Using the structural equation modeling, the study reveals that the mediation effect is only significant through the route of strong-tie civic talk but not the weak-tie civic talk. Also, the mediators (civic talk with strong ties, and civic attitudes) partially mediate the relationship between multi-platform news consumption and social networking site participation; and fully mediate the relationship between multi-platform news consumption and volunteering. However, the validity of this study is limited by its cross-sectional data. And there is also potential temporal validity issue as the study was conducted during the first lockdown period in Belgium.

+





# What methods do they use?

+

+



# What data are they using?

	Institutionalized participation	DNP	Protest	Volunteering	Consumerist participation
Worked for a party or candidate	0.864				
Donated money to a political organization	0.808				
Attended a political meeting	0.795				
Contacted a politician or official	0.670				
Commented on social media on political/social issues		0.906			
Posted or shared political links on social media		0.859			
Encouraged other people to take action using social media		0.809			
Signed a petition			0.809		
Worked for a political action group			0.728		
Joined a demonstration			0.527		
Other (coded open answers)			0.524		
Volunteered in a charitable organization				0.872	
Volunteered for a community project				0.838	
Bought products for political/ethical reasons					0.895
Boycotted products for political/ethical reasons					0.844
Donated money to a charitable organization					

DNP = digitally networked participation.

Varimax with Kaiser Normalization; matrix of tetrachoric correlations for 17 items not positive definite, therefore 'voting' is deleted from the analyses. Explained variance: 67%;  $N = 1004$ .

Source: [Theocharis & van Deth \(2018\)](#)