

Persons in Contexts: Idiographic Psychological Dynamics

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What is personality?

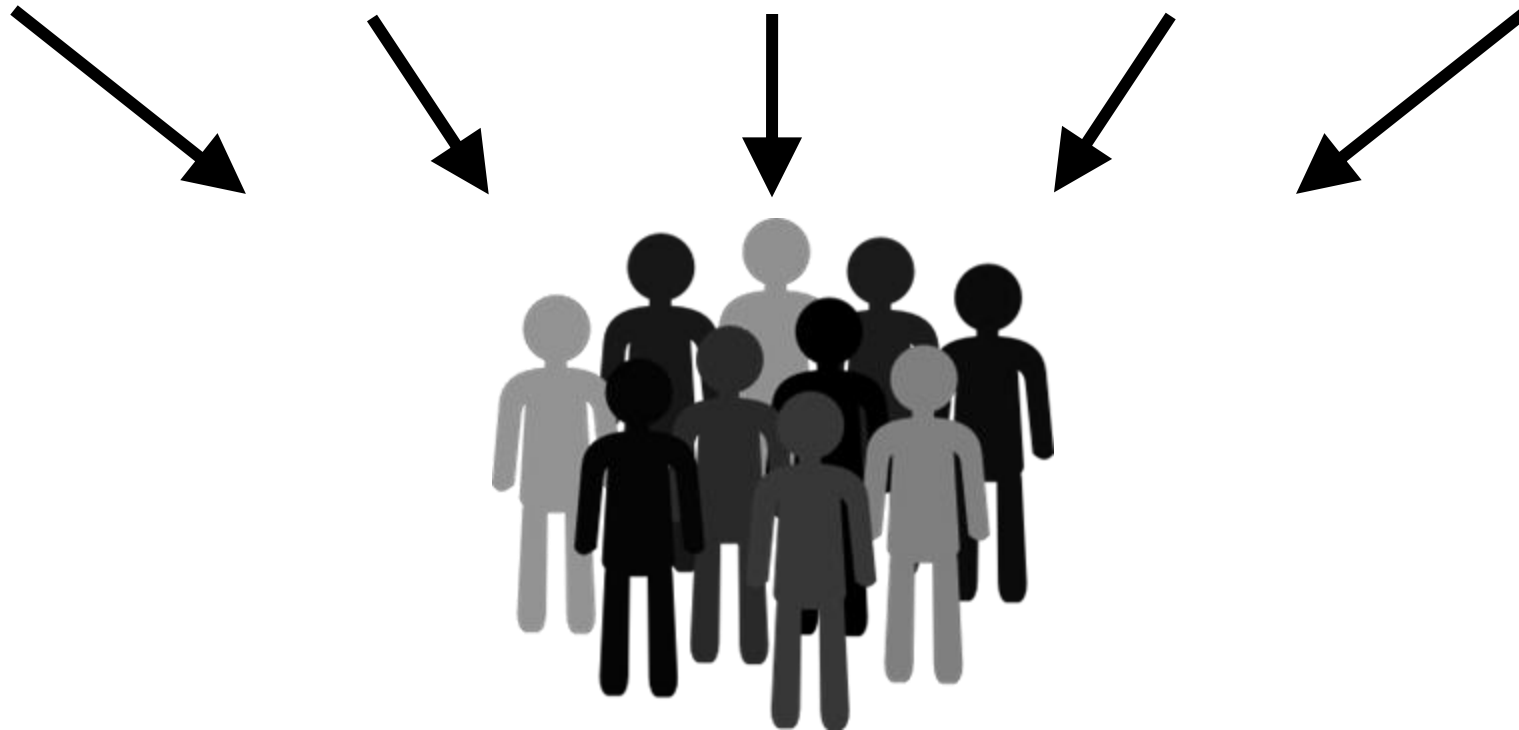


Nomothetic
Between-Person
Variable-Centered

What is personality?

Personality is what personality tests test.

(Jack Wright, personal communication, 2013)



Nomothetic
Between-Person
Variable-Centered

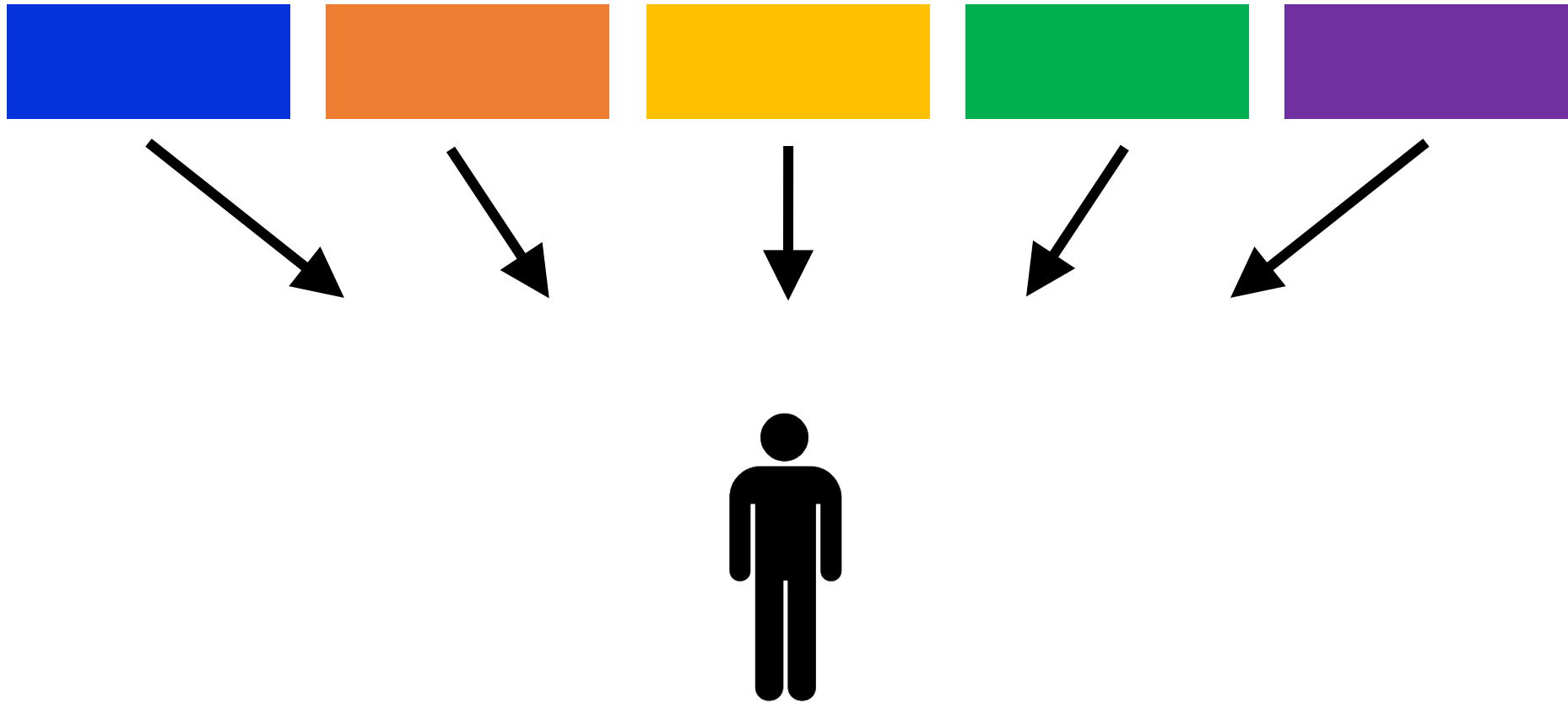
What is personality?

“Personality is the **dynamic organization** within the individual of those **psychophysical systems** that determine his **unique adjustments to the environment.**”

(Allport, 1937, p. 32)

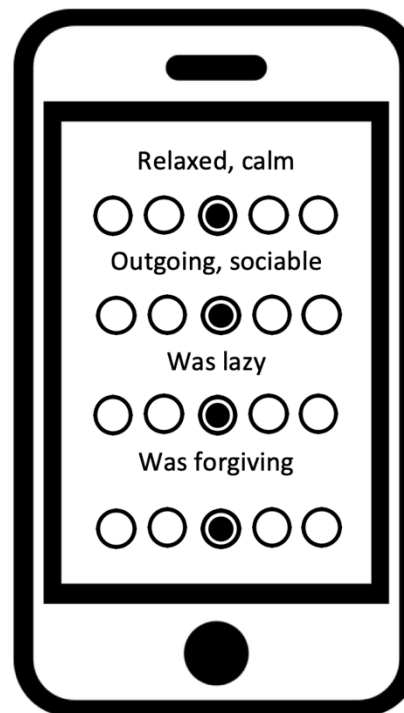


e.g., Allport, 1937, 1961, 1968

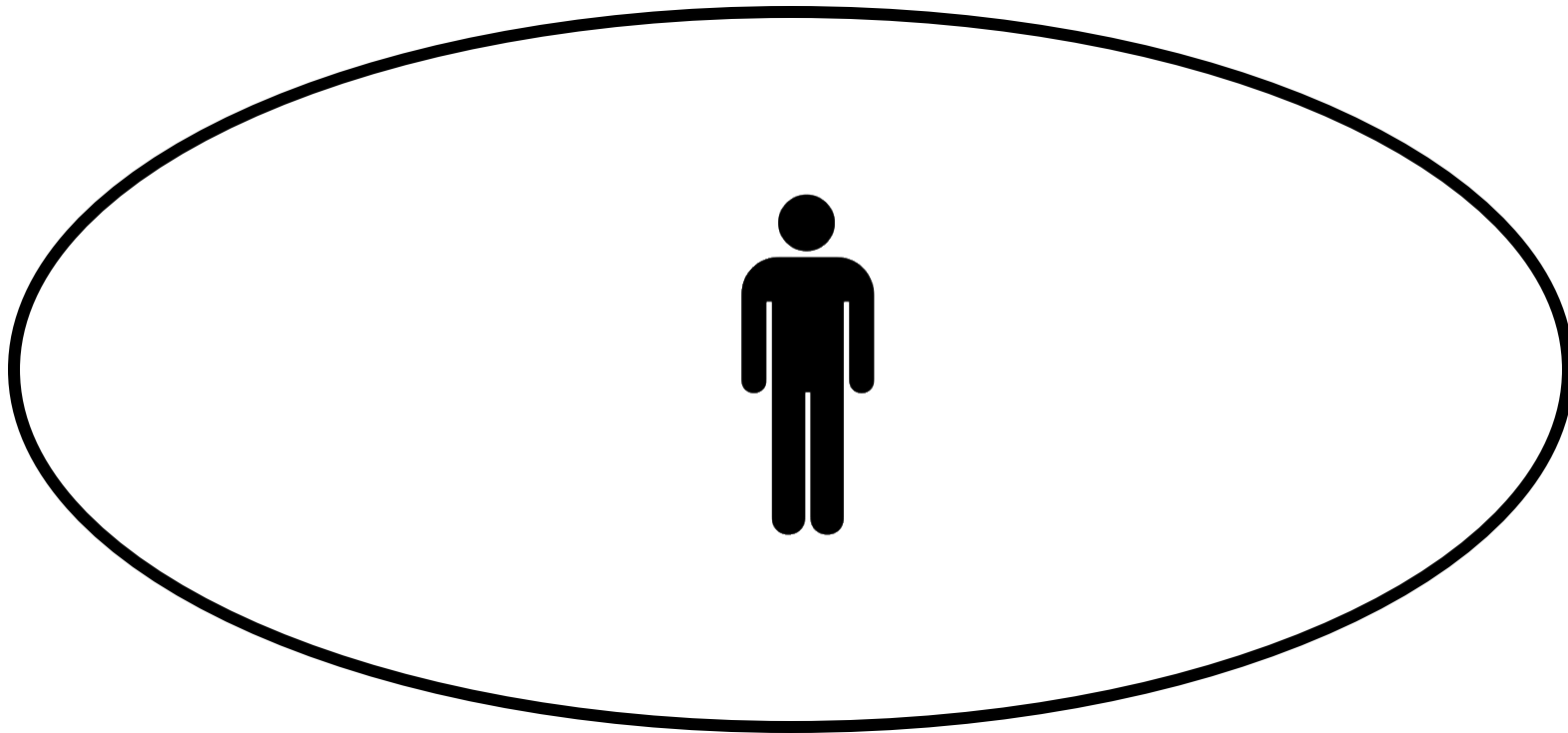


Idiographic Person-Specific

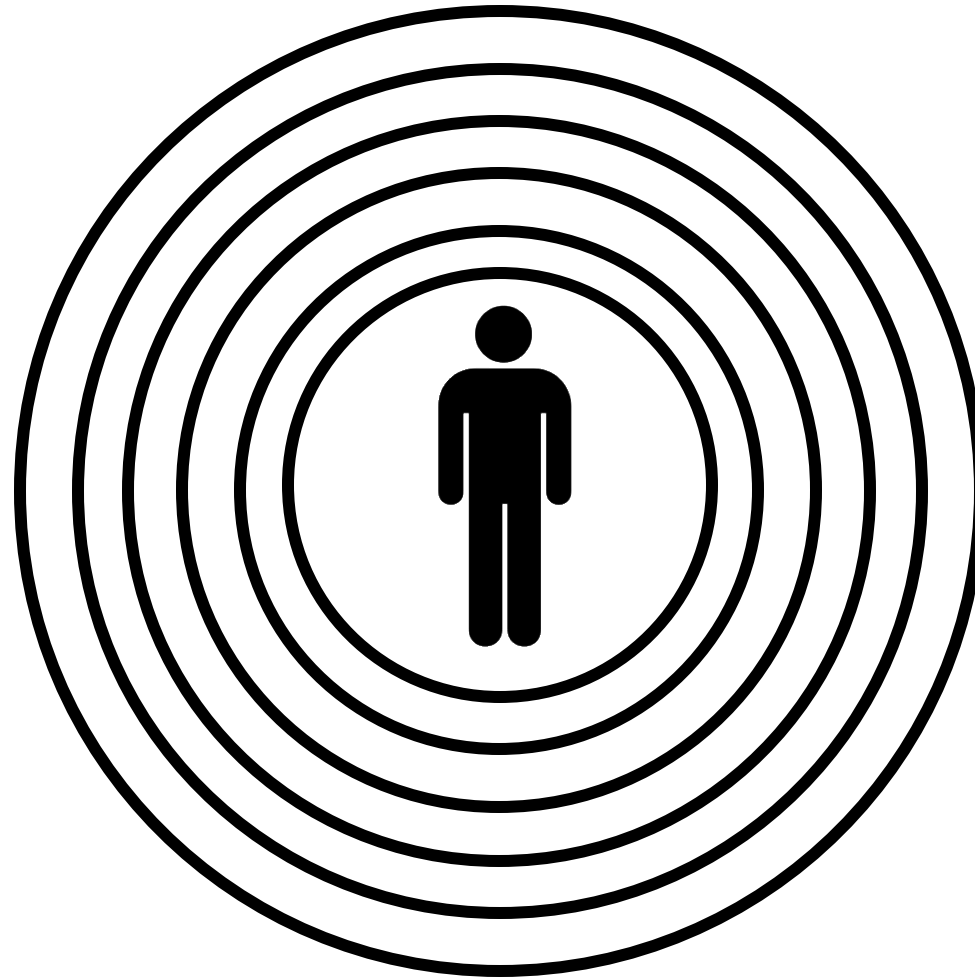
e.g., Beck & Jackson, 2020a, *JPSP*; 2020b, *CDPS*



Persons in Context



Persons in Context



Persons-in-Contexts Proposal 1:

People are not context-free, and no contexts are stronger than people (i.e. individual differences).



**Between-Person
Variable Centered**



**Idiographic
Person-Specific**



Strong Theoretical Models

Rich longitudinal data

Unique patterns ignored

Health

Income

Housing

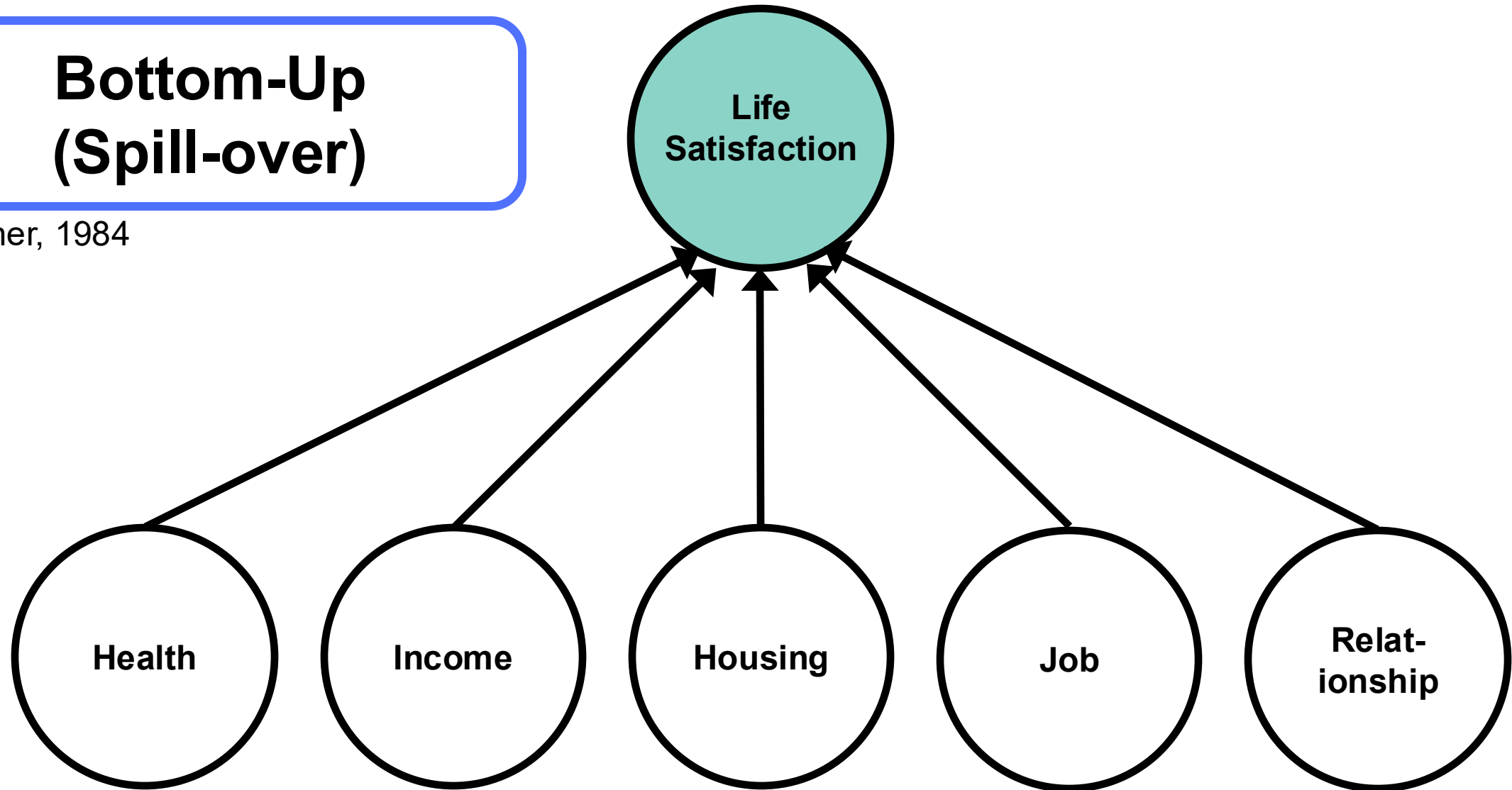
Job

Relationship

**Domain
Satisfaction**

Bottom-Up (Spill-over)

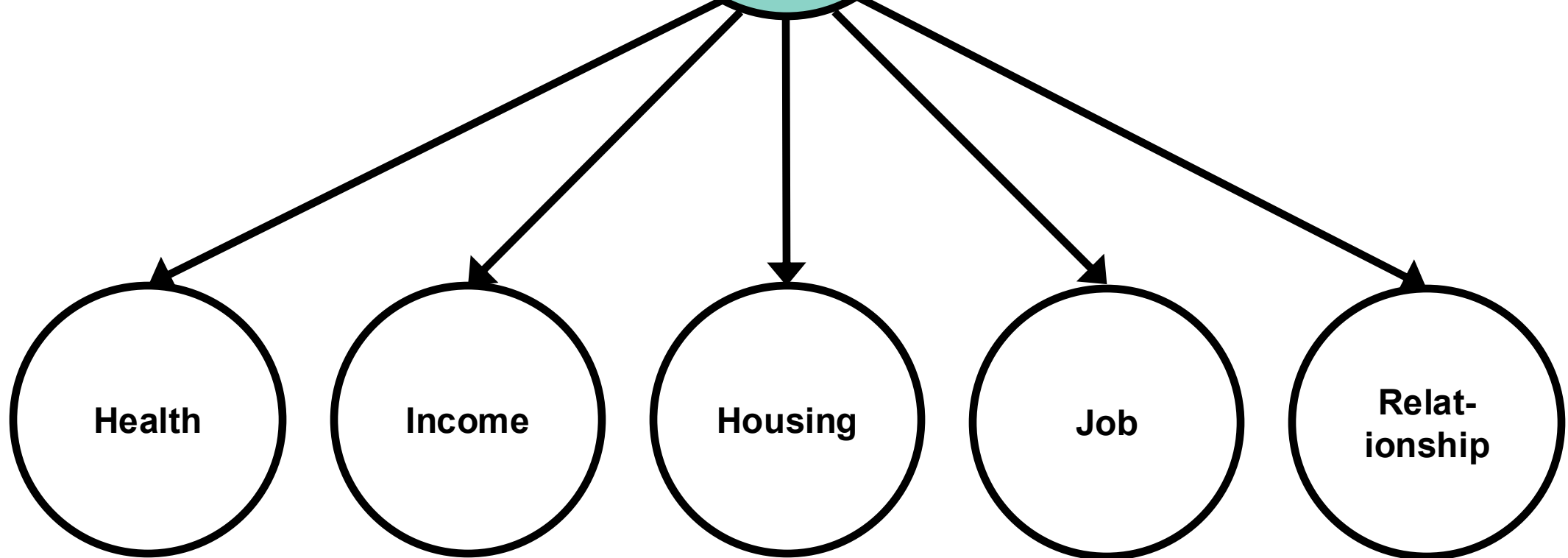
Diener, 1984



Beck, Cheung, Thapa, & Jackson (revision submitted; *NHB*)

Top-Down (Dispositional)

Diener, 1984

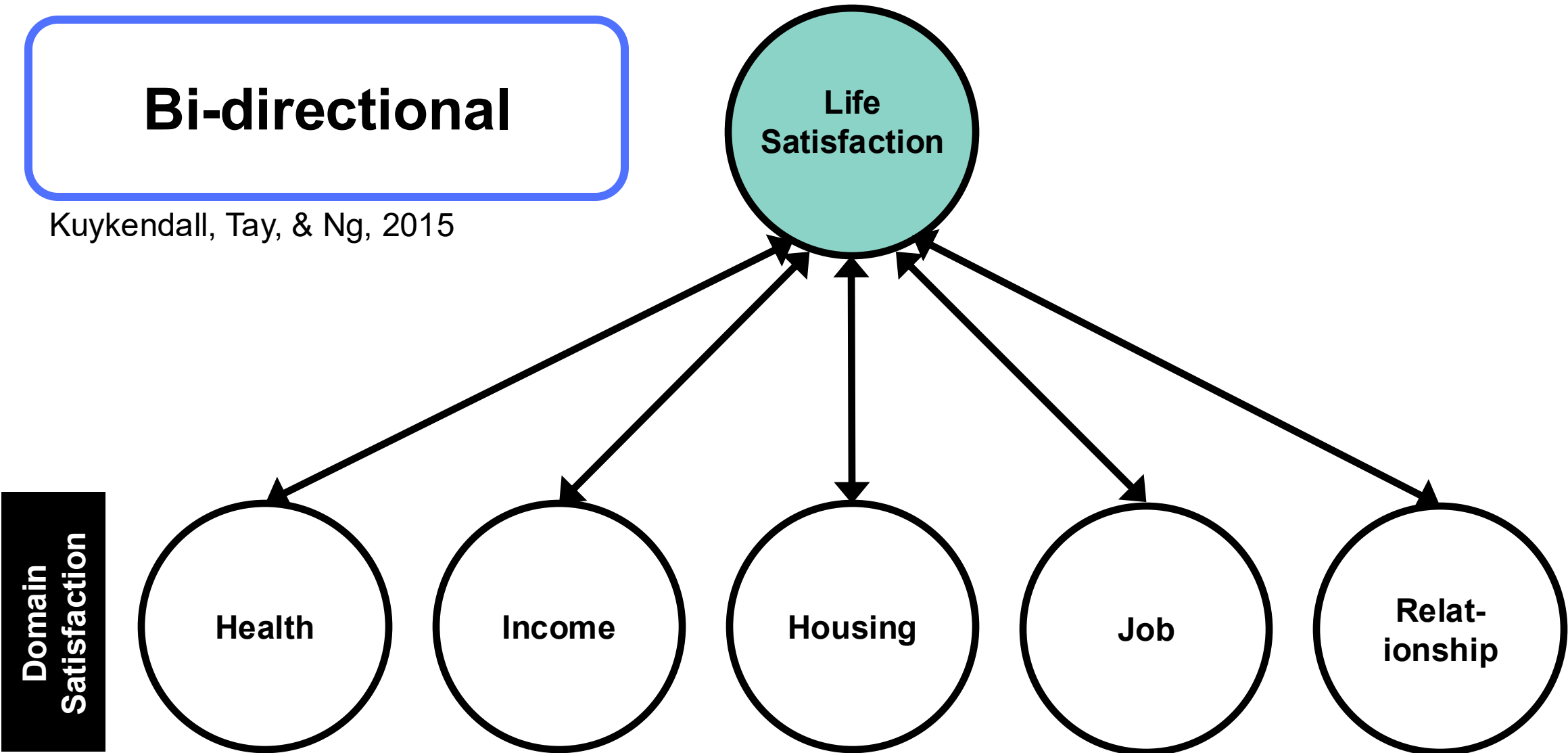


Domain
Satisfaction

Beck, Cheung, Thapa, & Jackson (revision submitted; *NHB*)

Bi-directional

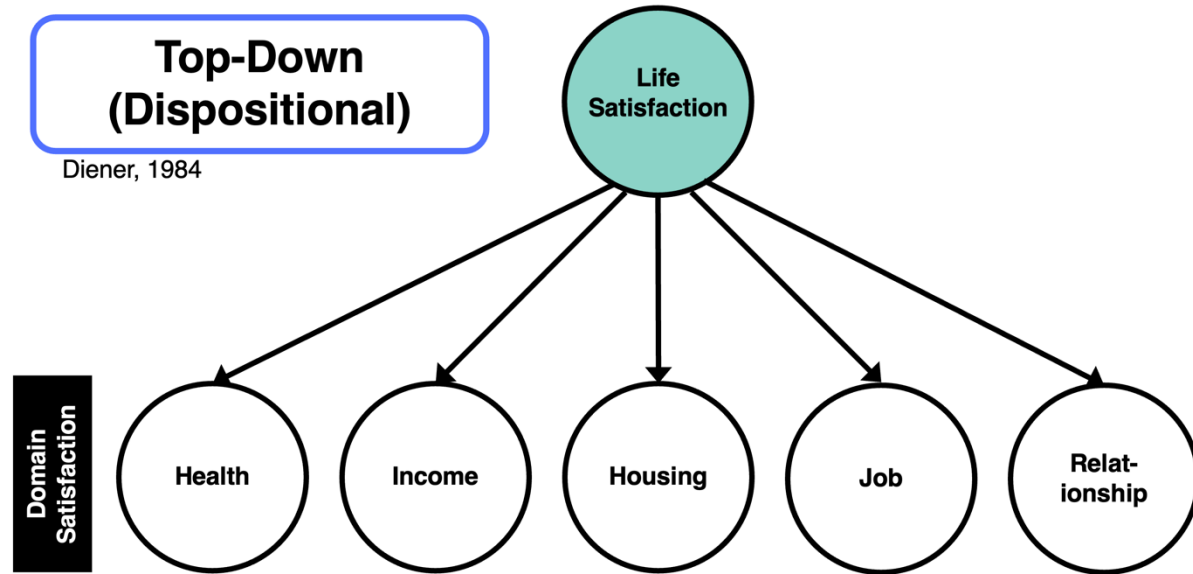
Kuykendall, Tay, & Ng, 2015



Beck, Cheung, Thapa, & Jackson (revision submitted; *NHB*)

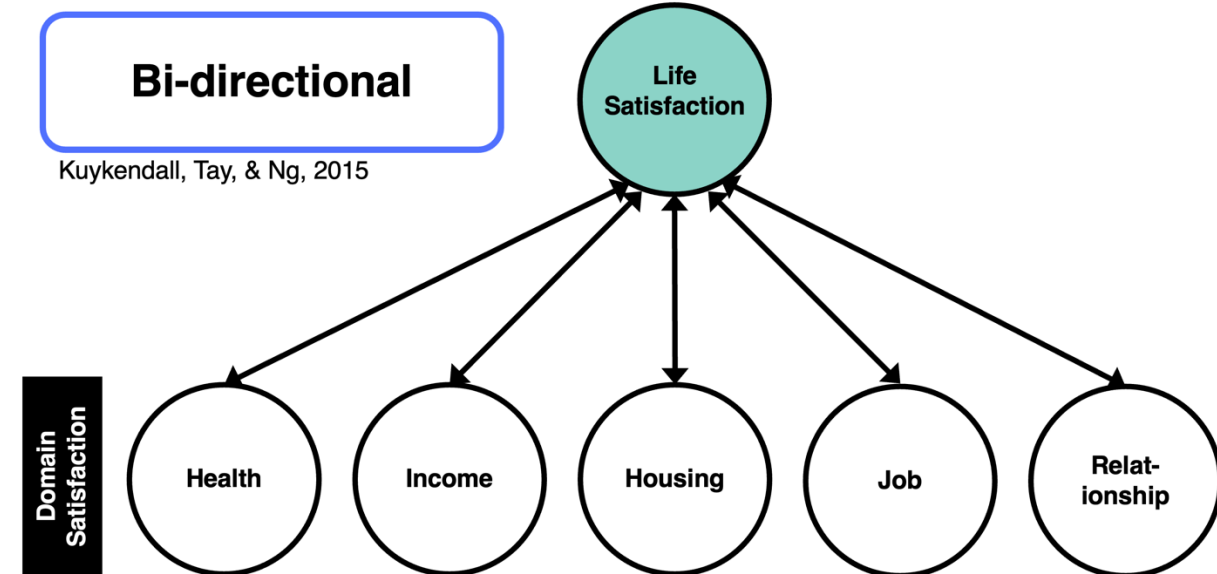
Top-Down (Dispositional)

Diener, 1984

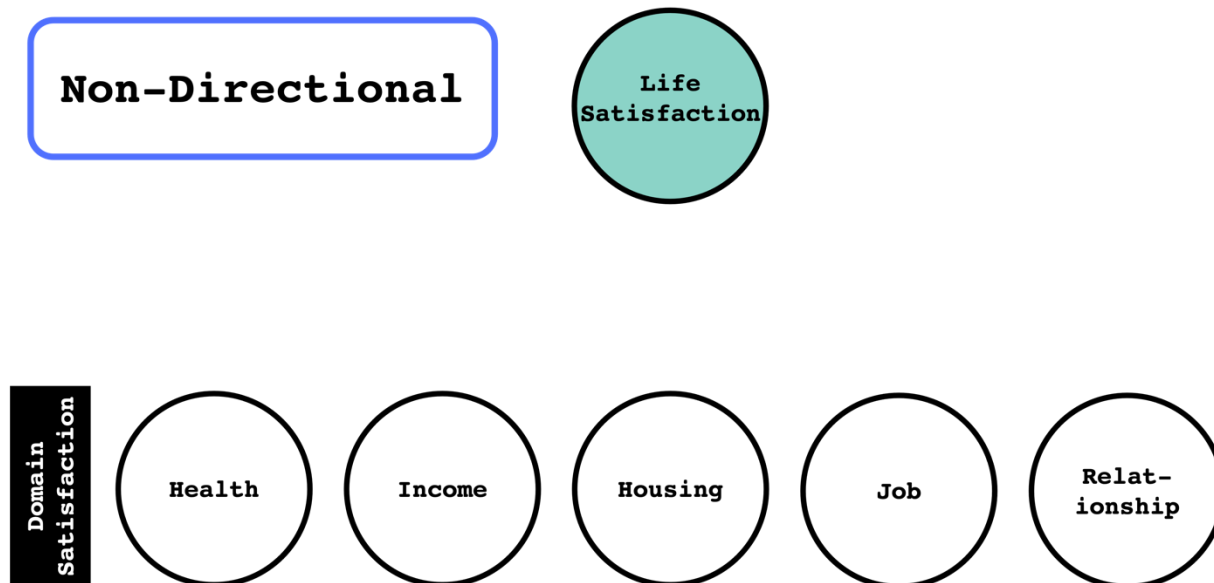


Bi-directional

Kuykendall, Tay, & Ng, 2015

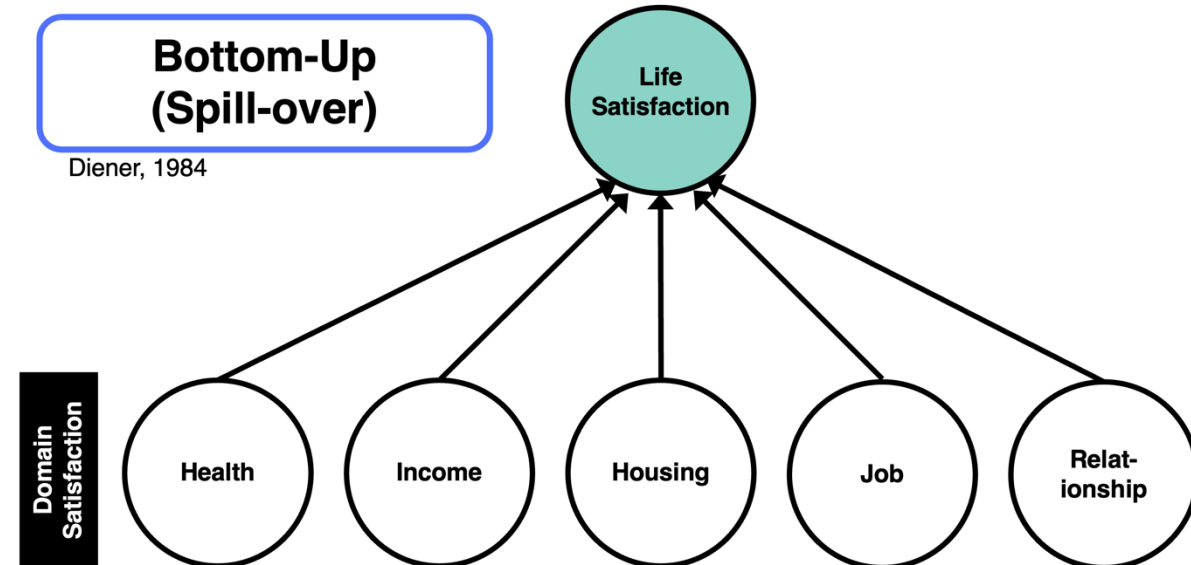


Non-Directional

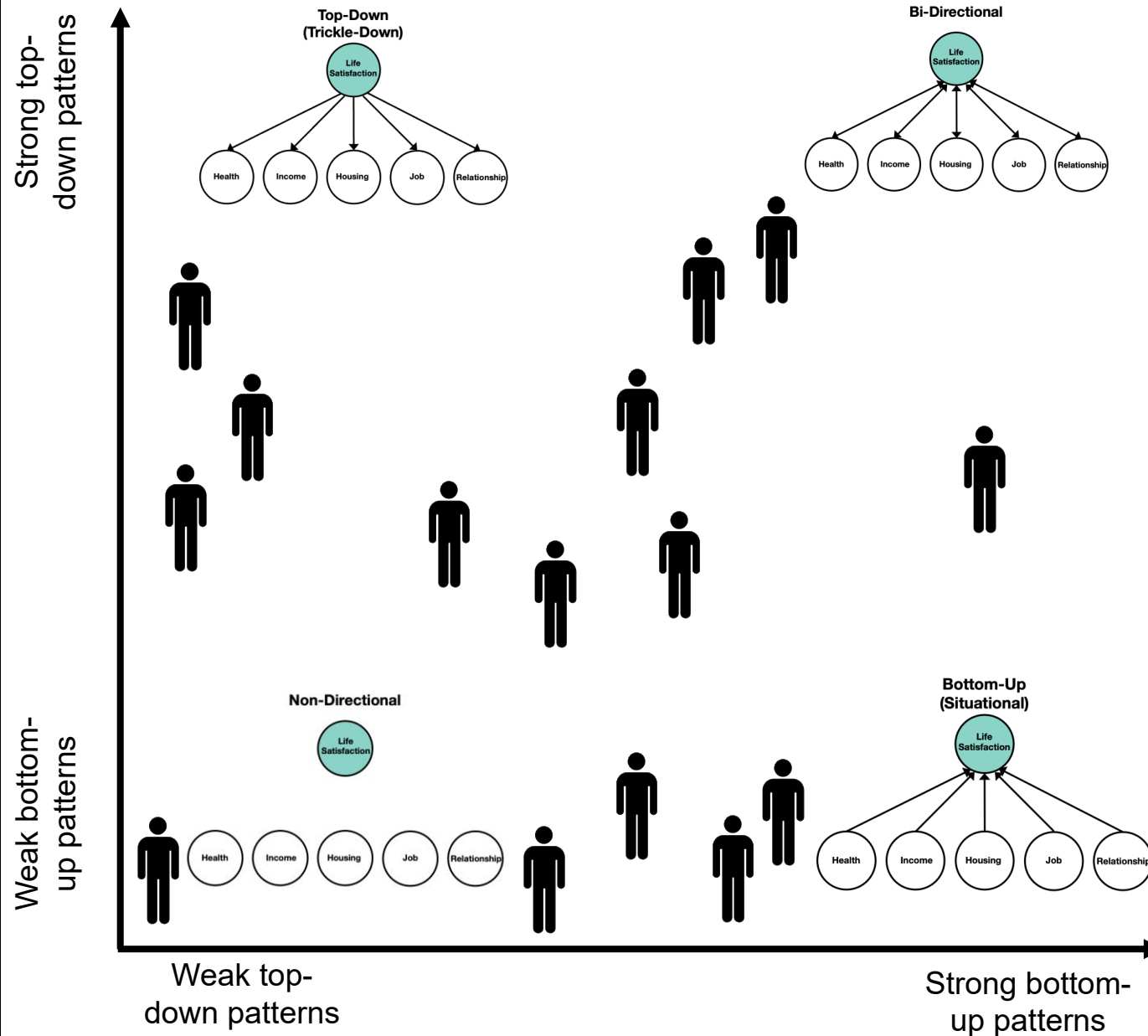


Bottom-Up (Spill-over)

Diener, 1984



Personalised Perspectives on Happiness: For whom is each theory correct?



GSOEP

HILDA

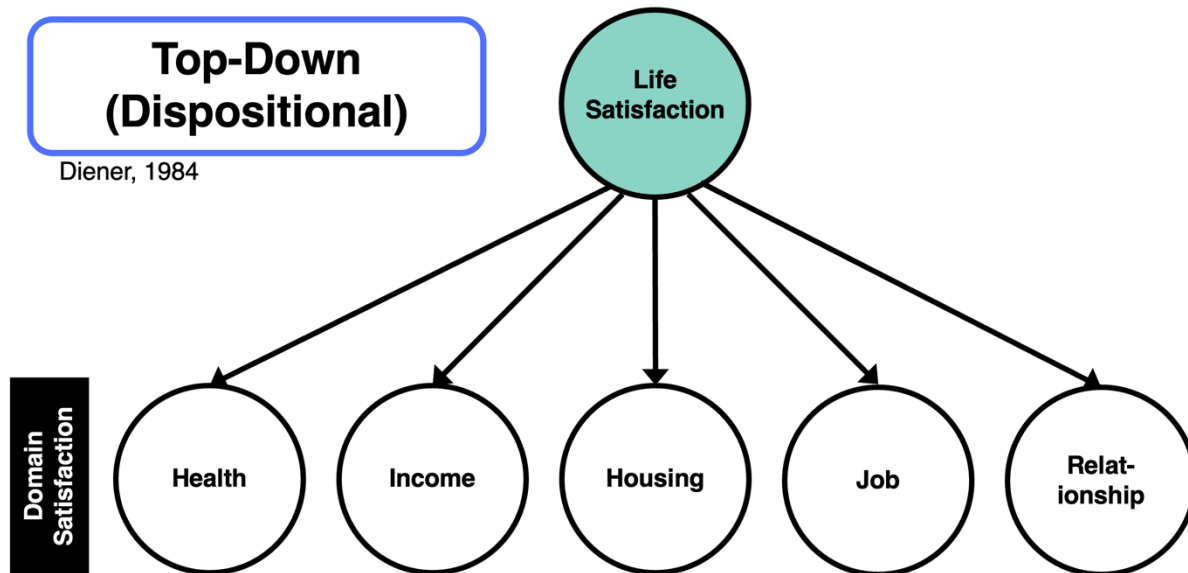
SHP

BHPS

LISS

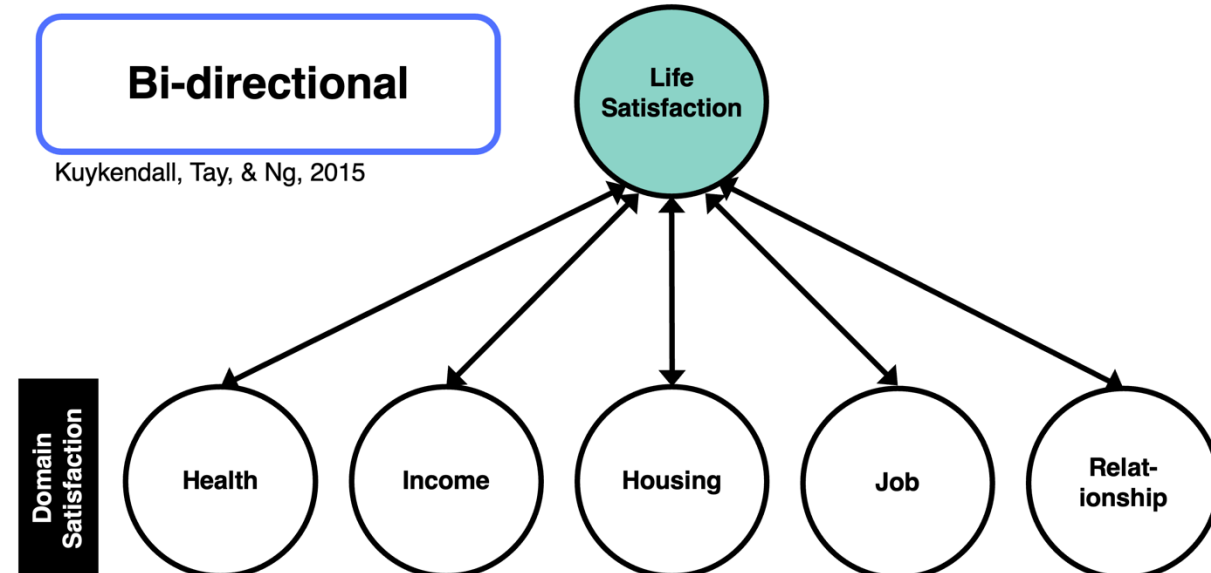
**Top-Down
(Dispositional)**

Diener, 1984

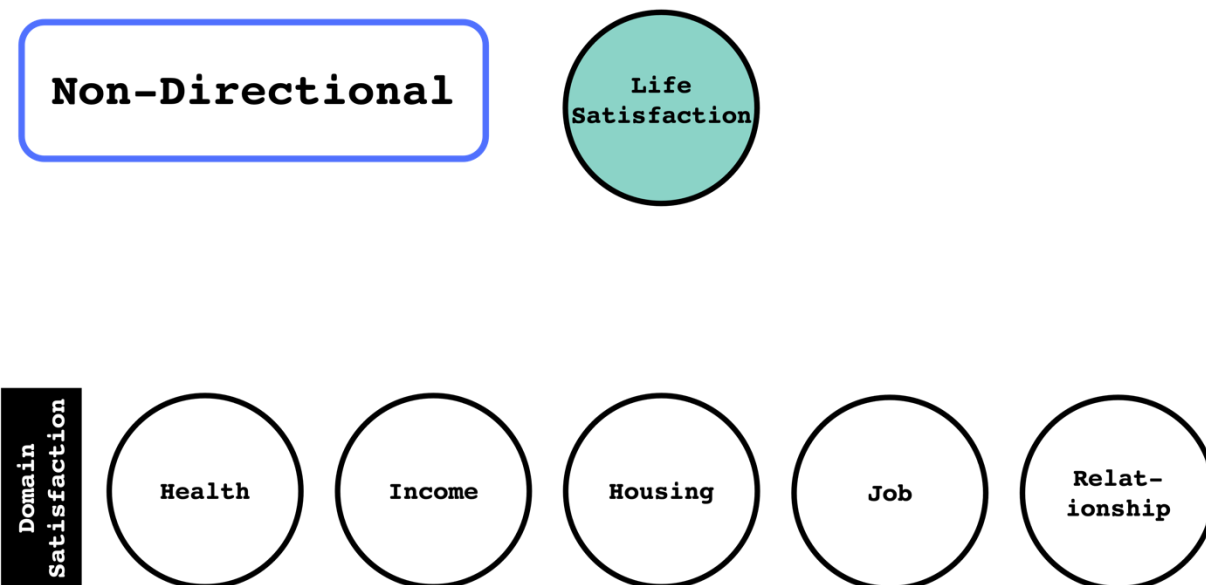


Bi-directional

Kuykendall, Tay, & Ng, 2015

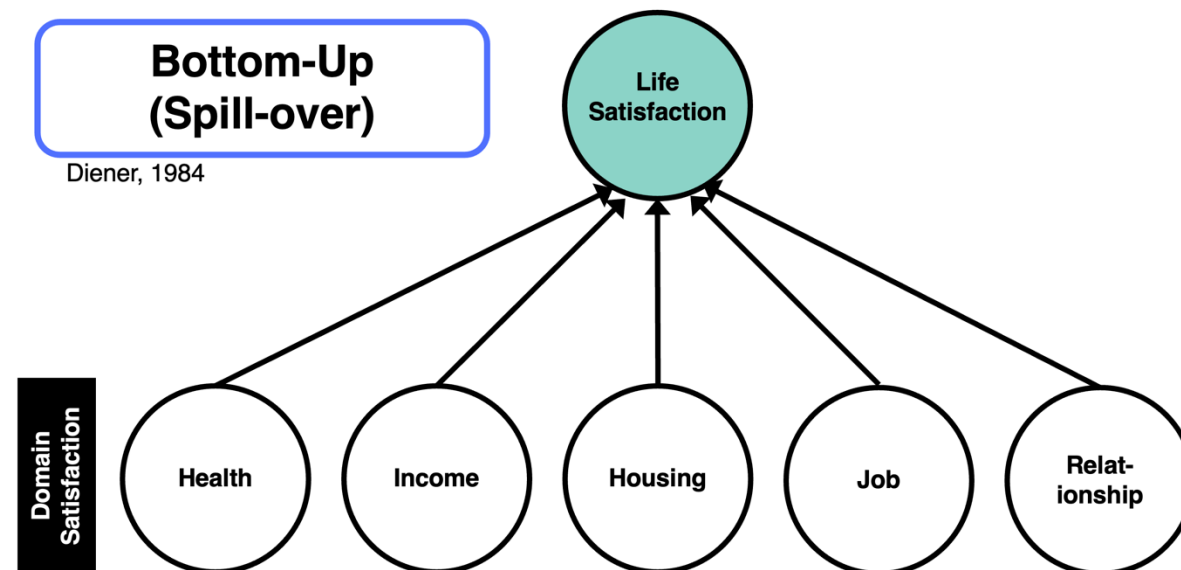


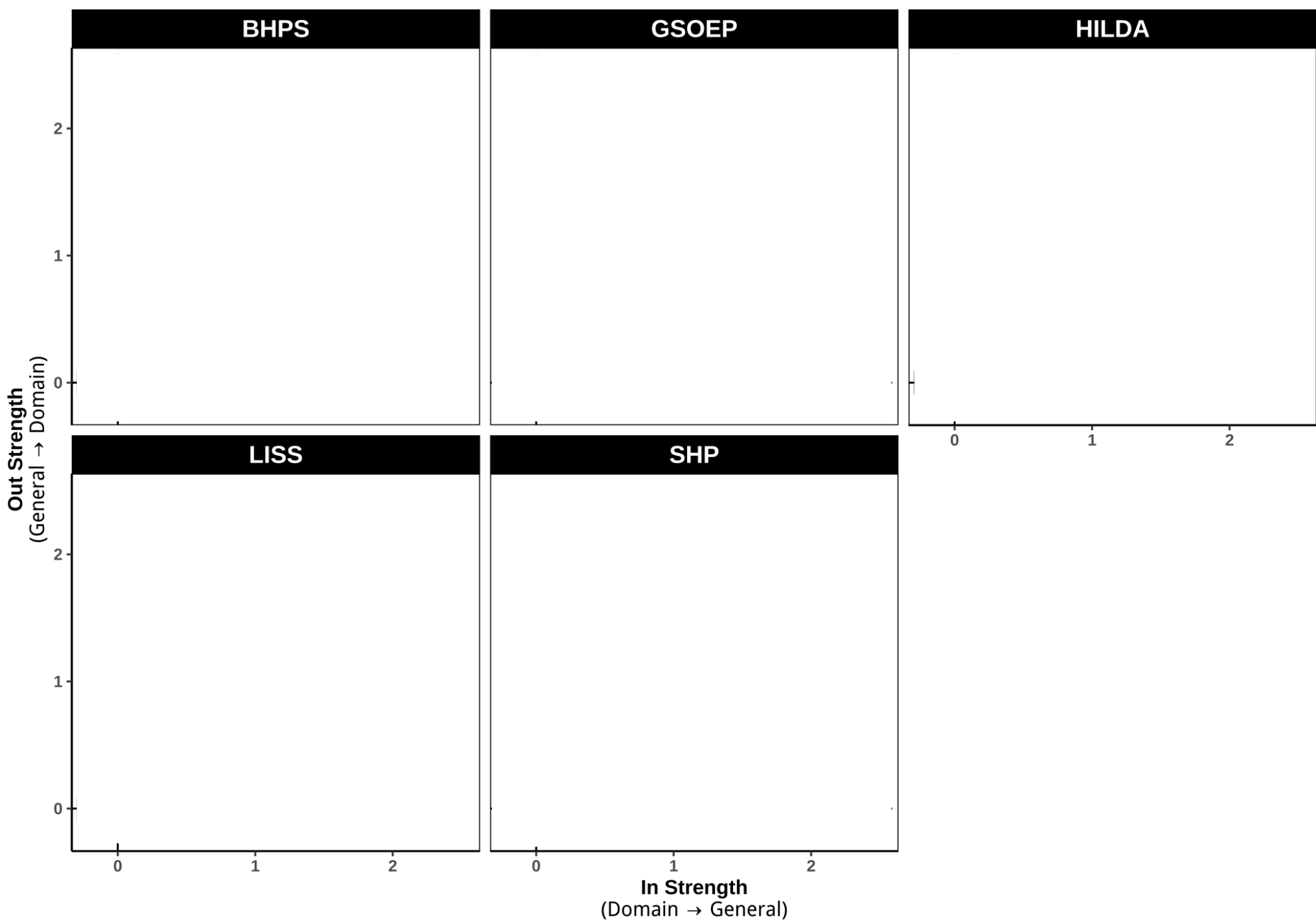
Non-Directional

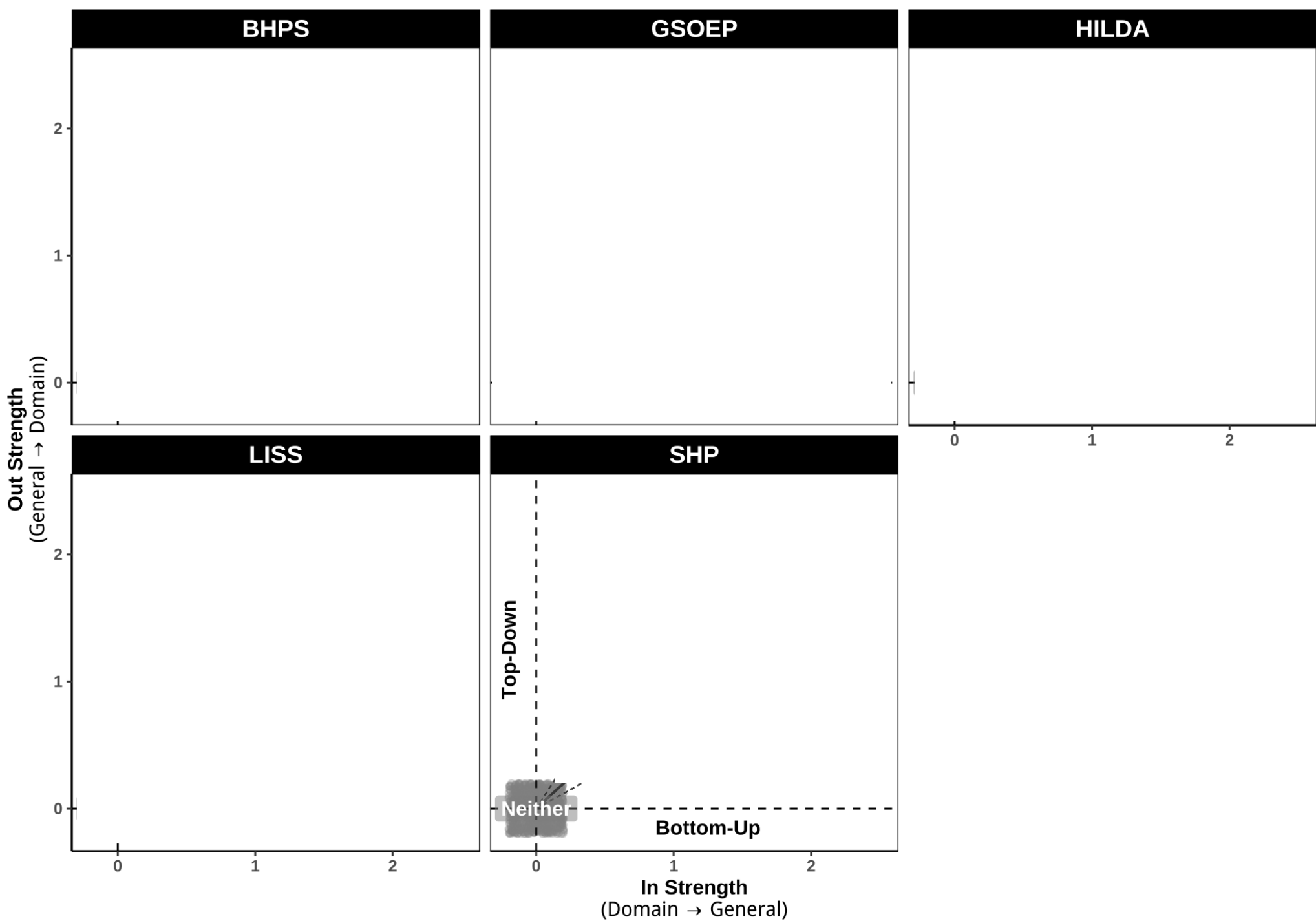


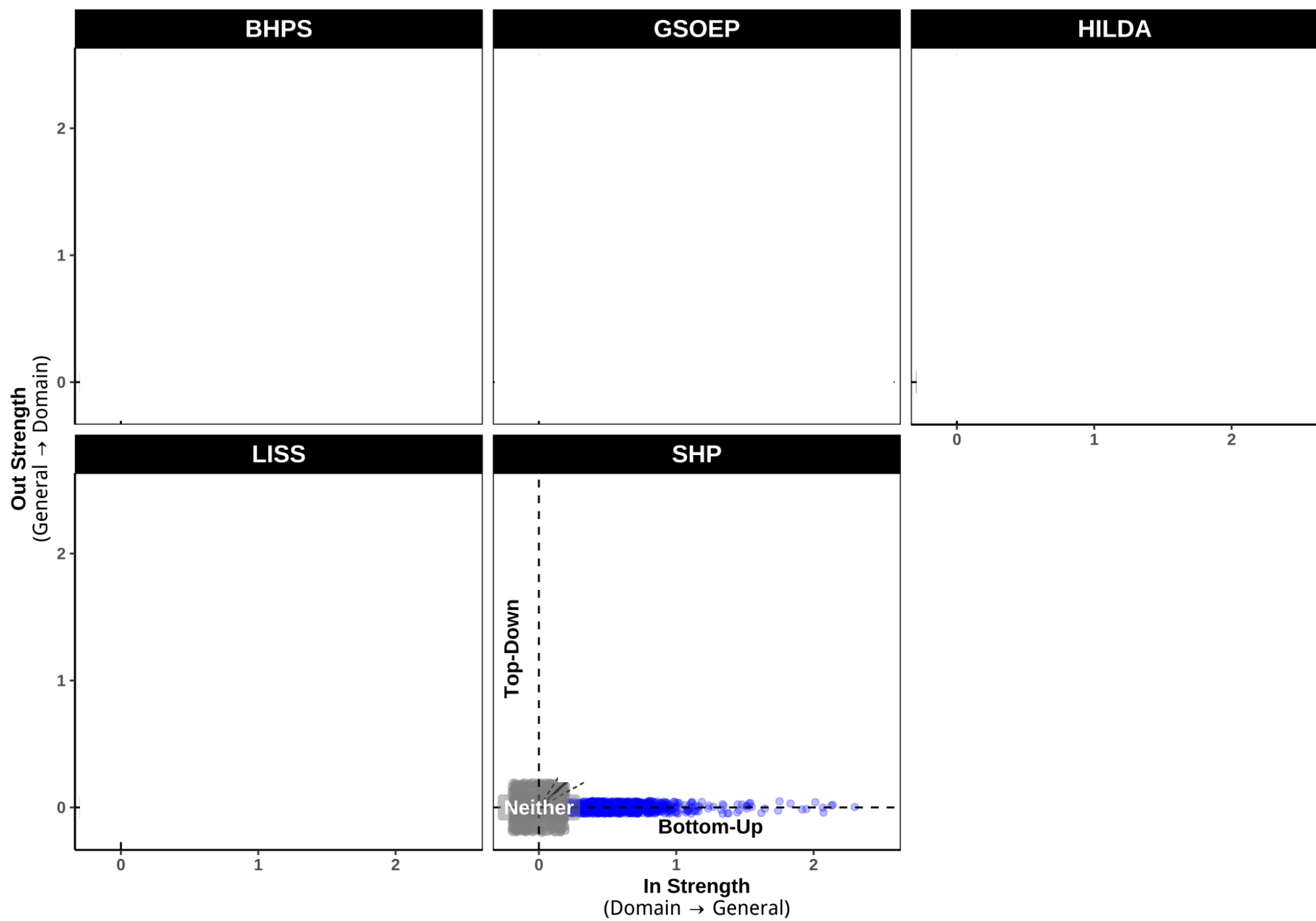
**Bottom-Up
(Spill-over)**

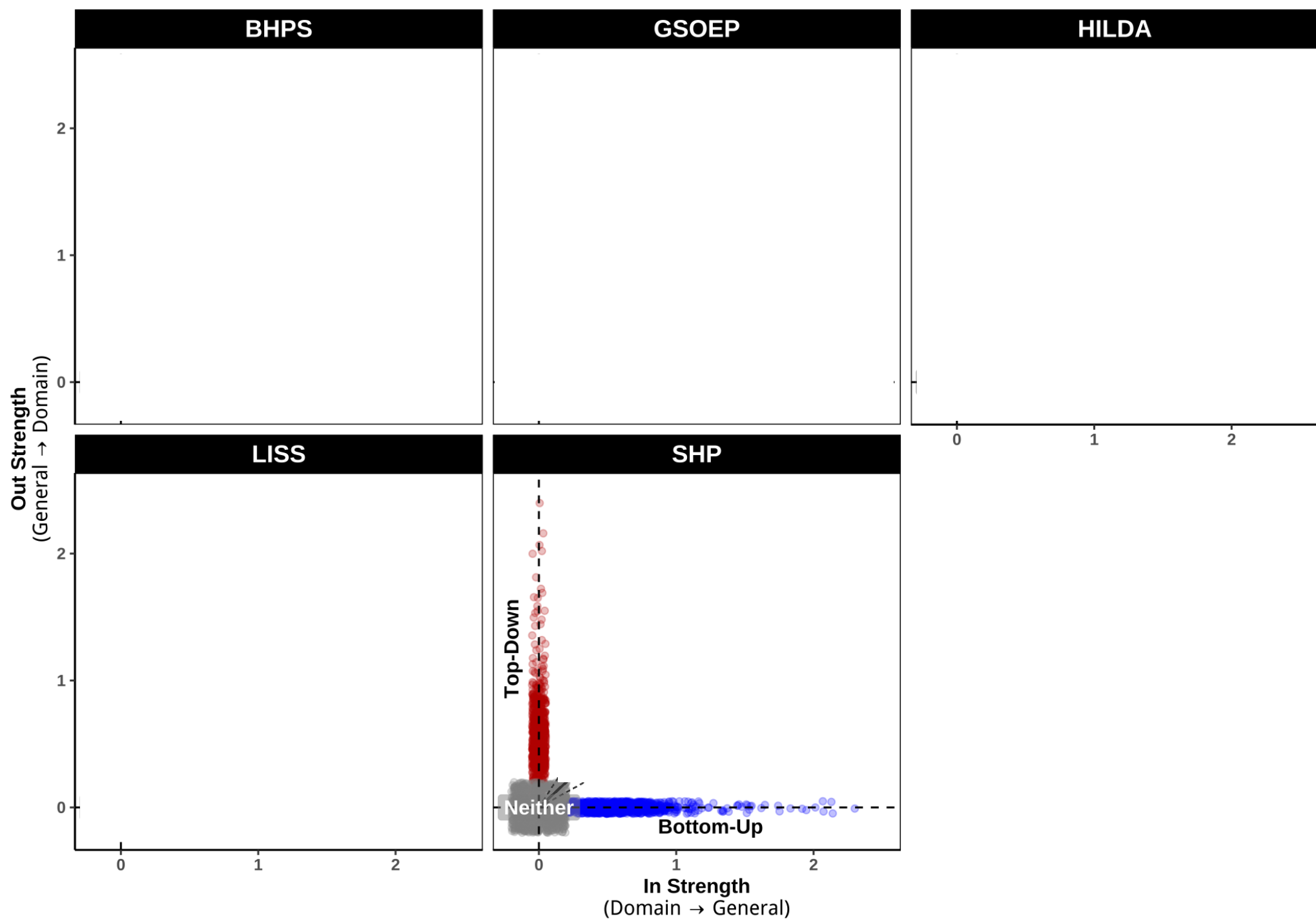
Diener, 1984

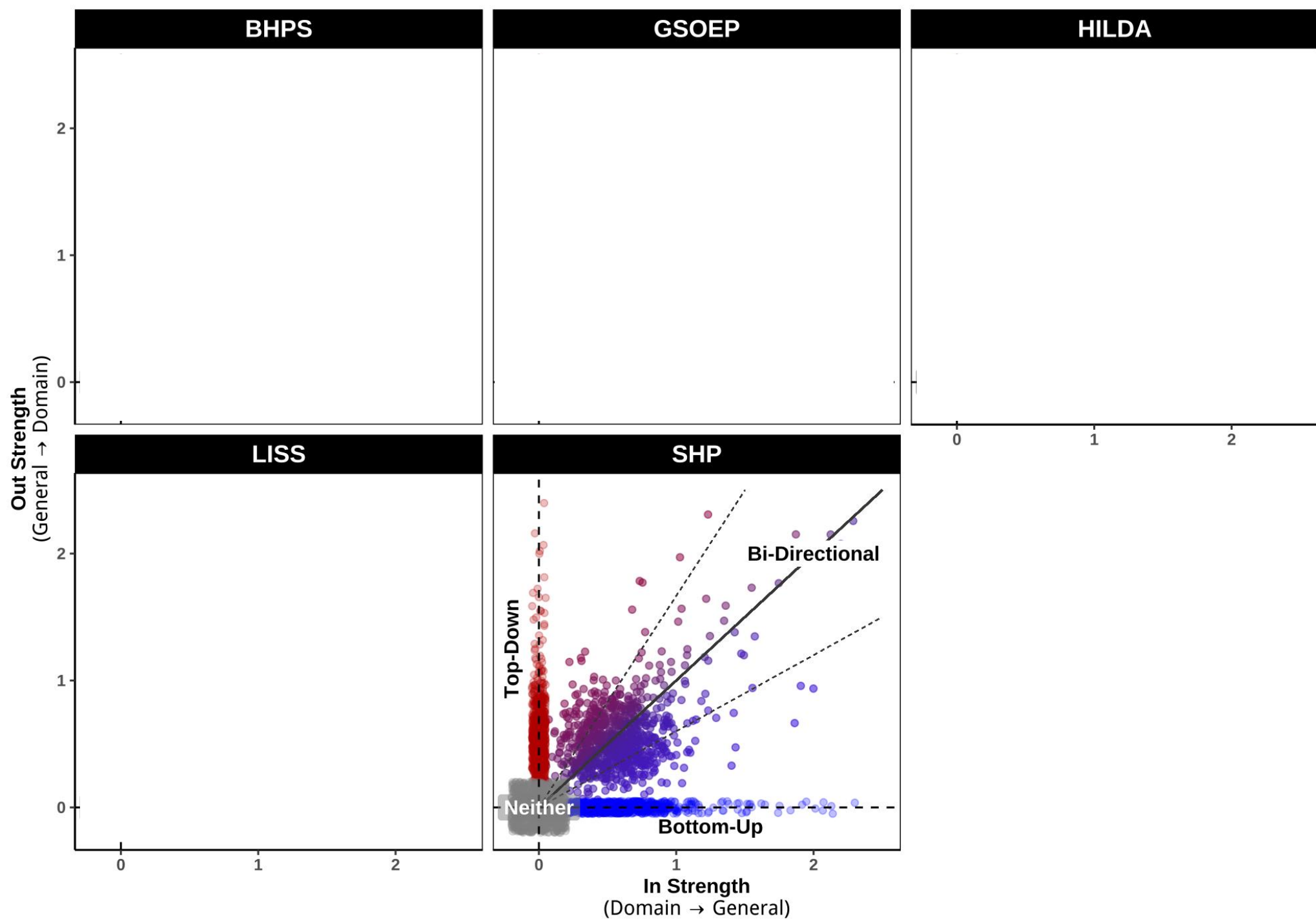


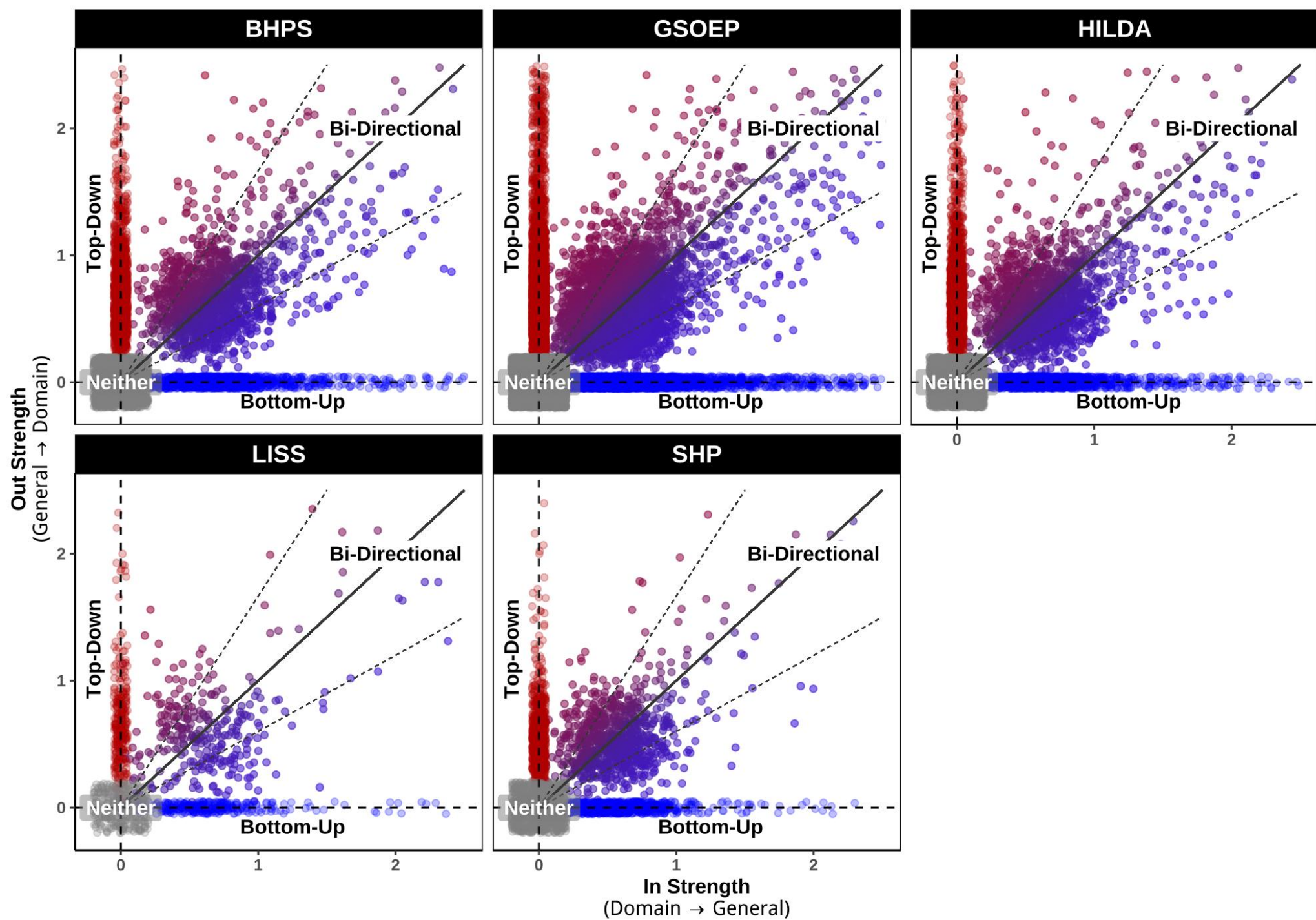














Interim Summary

1

The dynamics of well-being unfold differently across people

2

Individual differences in how dynamics unfold map onto different theories of well-being

3

Whether the person or their context matters more for well-being differs across people

Persons-in-Contexts Proposal 3:

Rather than asking whether persons *OR* situations matter, we should be looking at persons in their own contexts and allow both to have varying impacts.

Psychological

Situations



```
graph TD; A[Psychological] --> D[Behavior / Experiences]; B[Situations] --> D;
```

**Behavior /
Experiences**

Critical Assumption

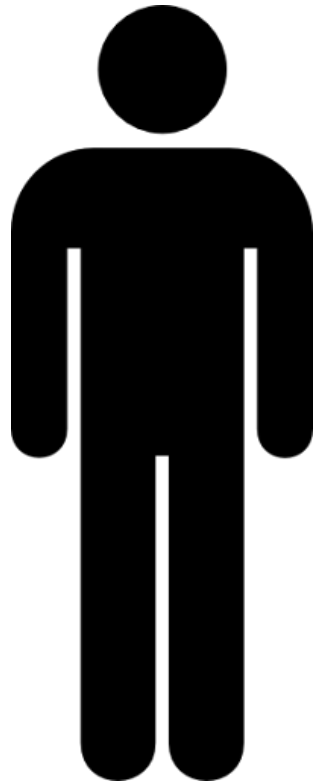
**Situations and experiences
should have similar
consequences across people.**

**People with similar levels of a
personality characteristic
should behave in similar ways.**

Alternative Assumption

Situations and experiences
should have *different*
consequences across people.

People with similar levels of a
personality characteristic *may*
not behave in similar ways.



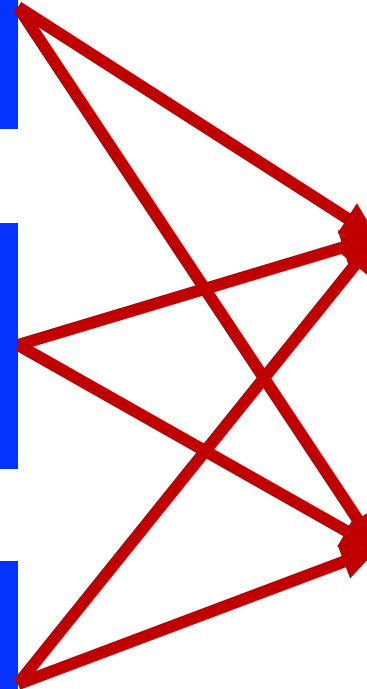
Psychological

Situational

Time

Behaviors

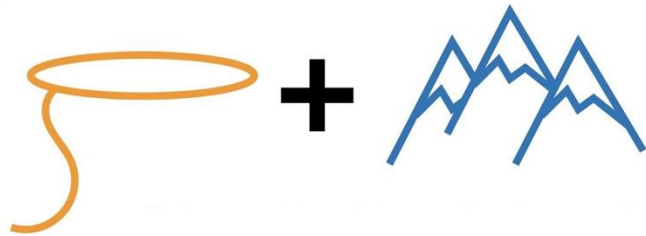
Experiences



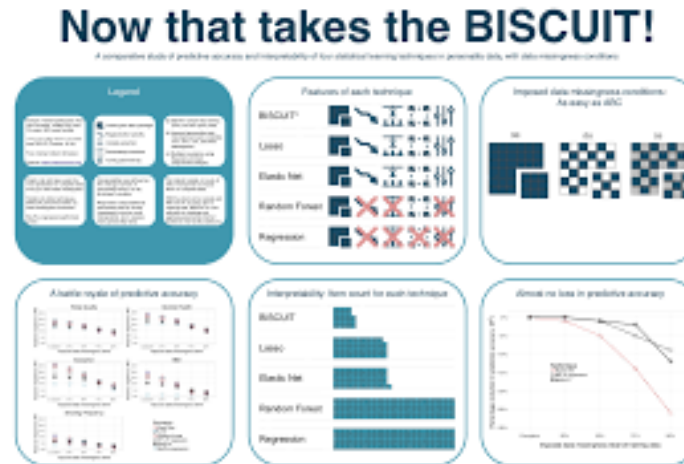
Analytic Plan

3 machine learning classification methods:

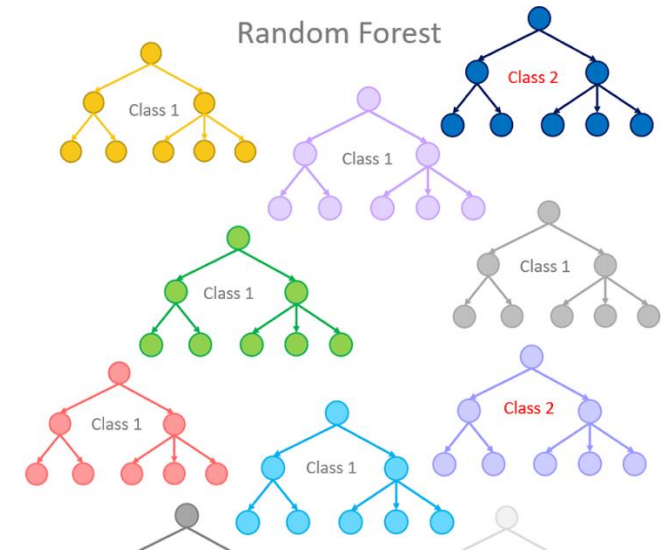
Elastic Net



BISCWIT



Random Forest

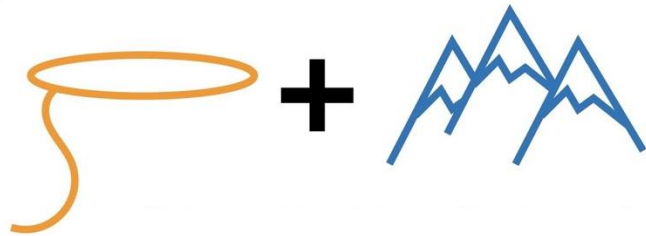


- Classification Accuracy
- Area under the receiver operating curve (AUC)

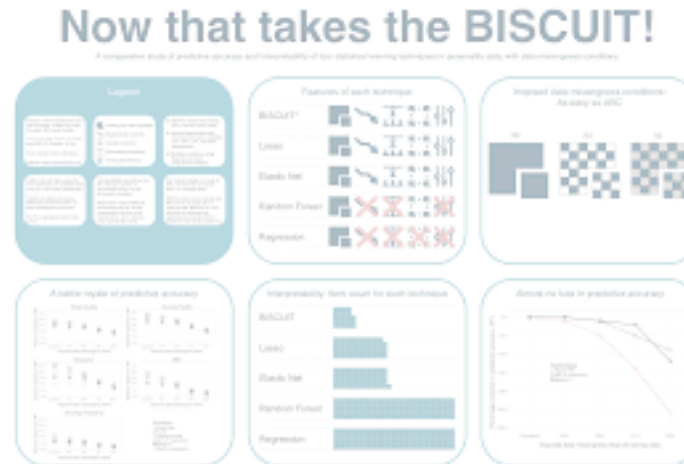
Analytic Plan

3 machine learning classification methods:

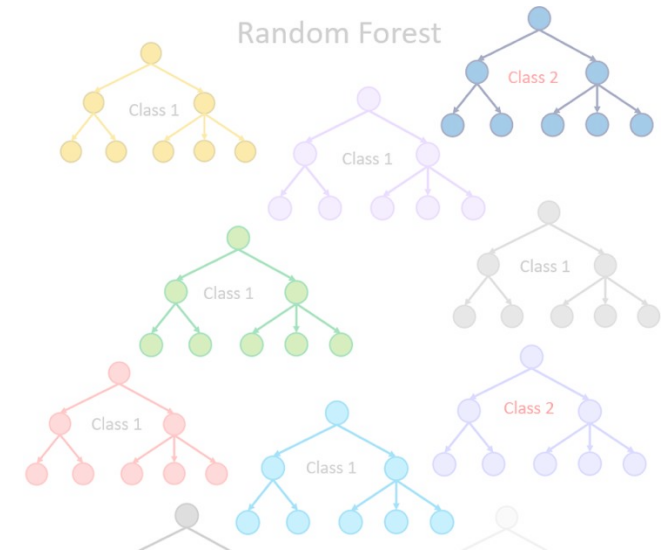
Elastic Net



BISCWIT



Random Forest



- Classification Accuracy
- Area under the receiver operating curve (AUC)

Classification Accuracy

	Elastic Net	
	Median (SD)	N
Procrastination		
Loneliness		
Argument		
Interacted		
Studying		
Sick		
Tired		

Classification Accuracy

Elastic Net

Classification accuracy was high, on average, with some variability across outcomes.

Sick

Tired

Do certain categories of features out-predict others?

Do certain categories of features out-predict others?

Elastic Net

Participant ID

Feature Category



Time



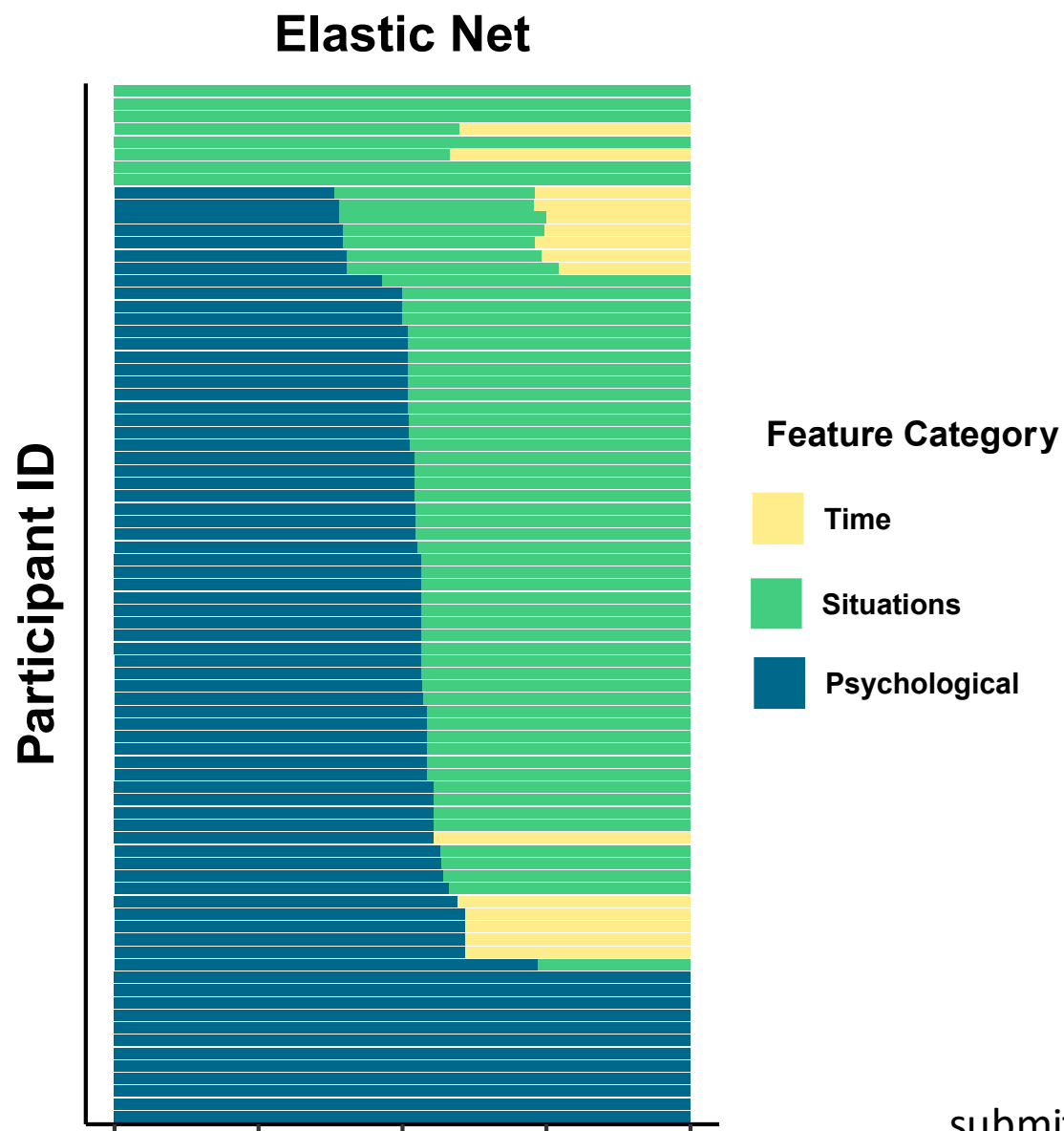
Situations



Psychological

Beck & Jackson (2023, *Psychological Science*)

Do certain categories of features out-predict others?

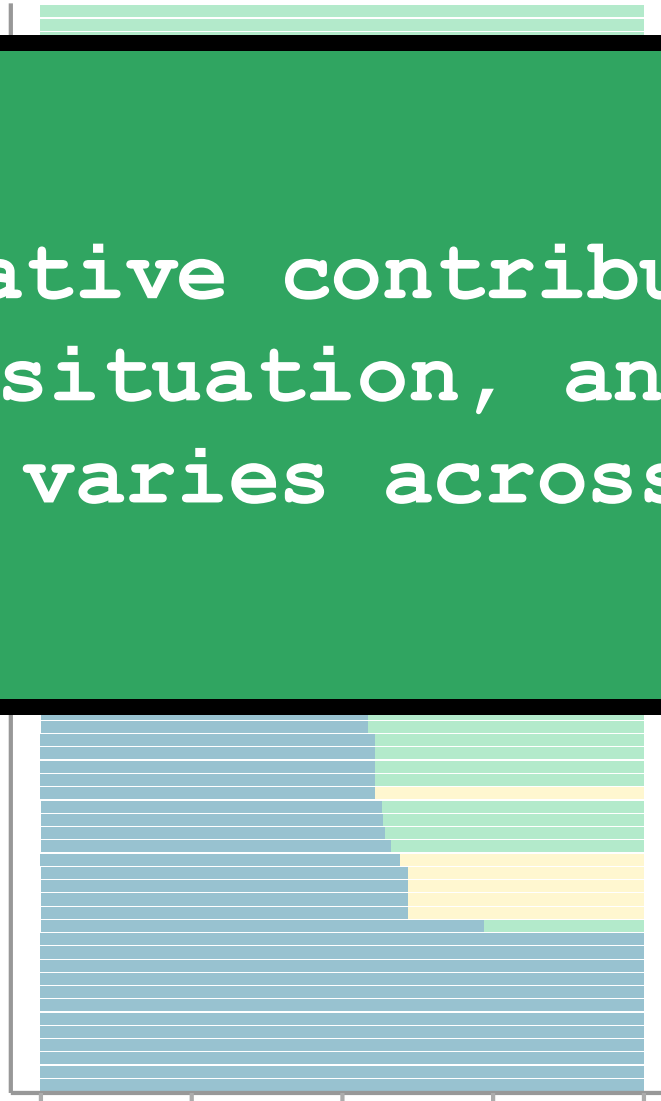


Beck & Jackson (revision submitted, *Psychological Science*)

Do certain categories of features out-predict others?

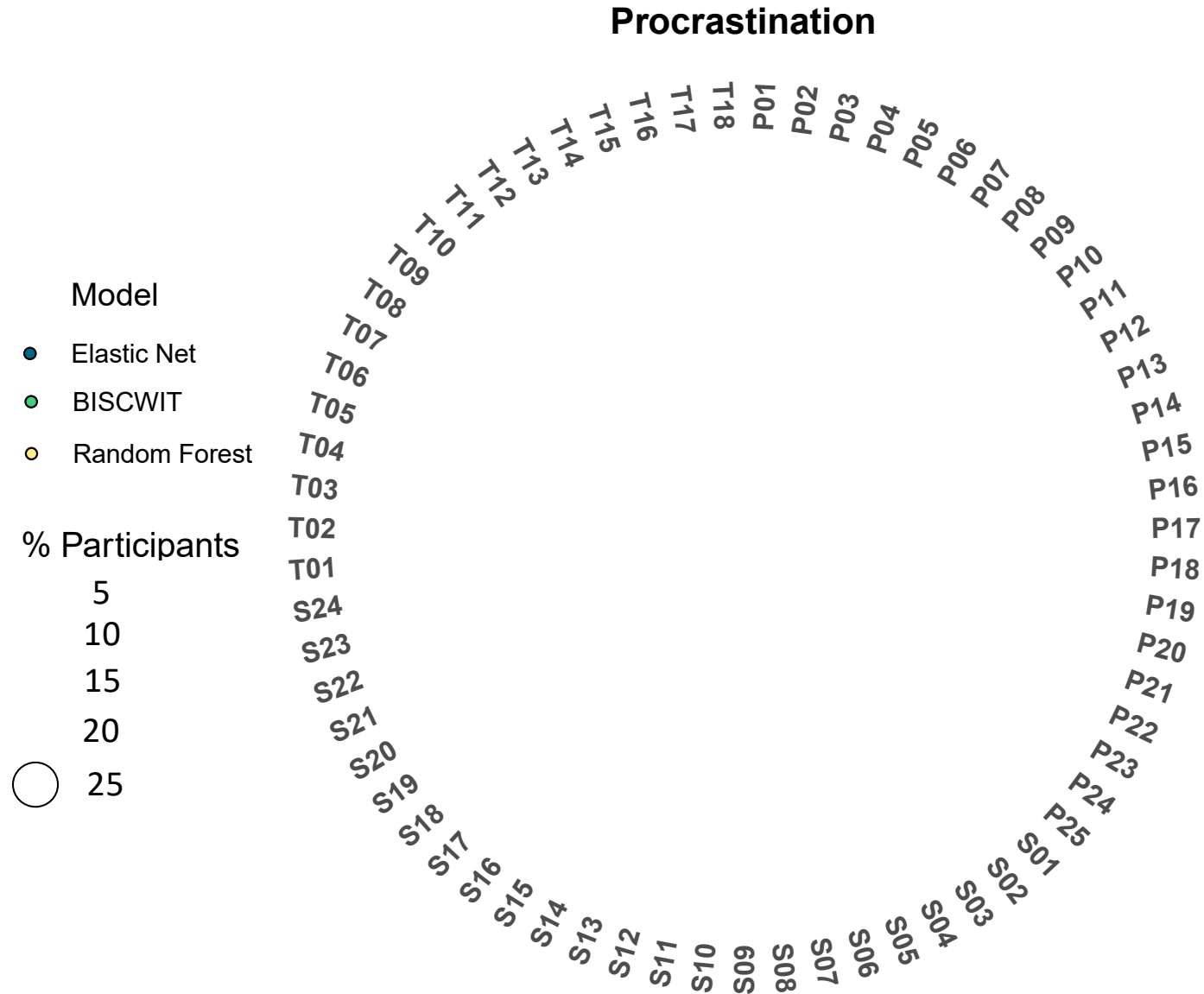
Elastic Net

The relative contribution of person, situation, and timing features varies across people.

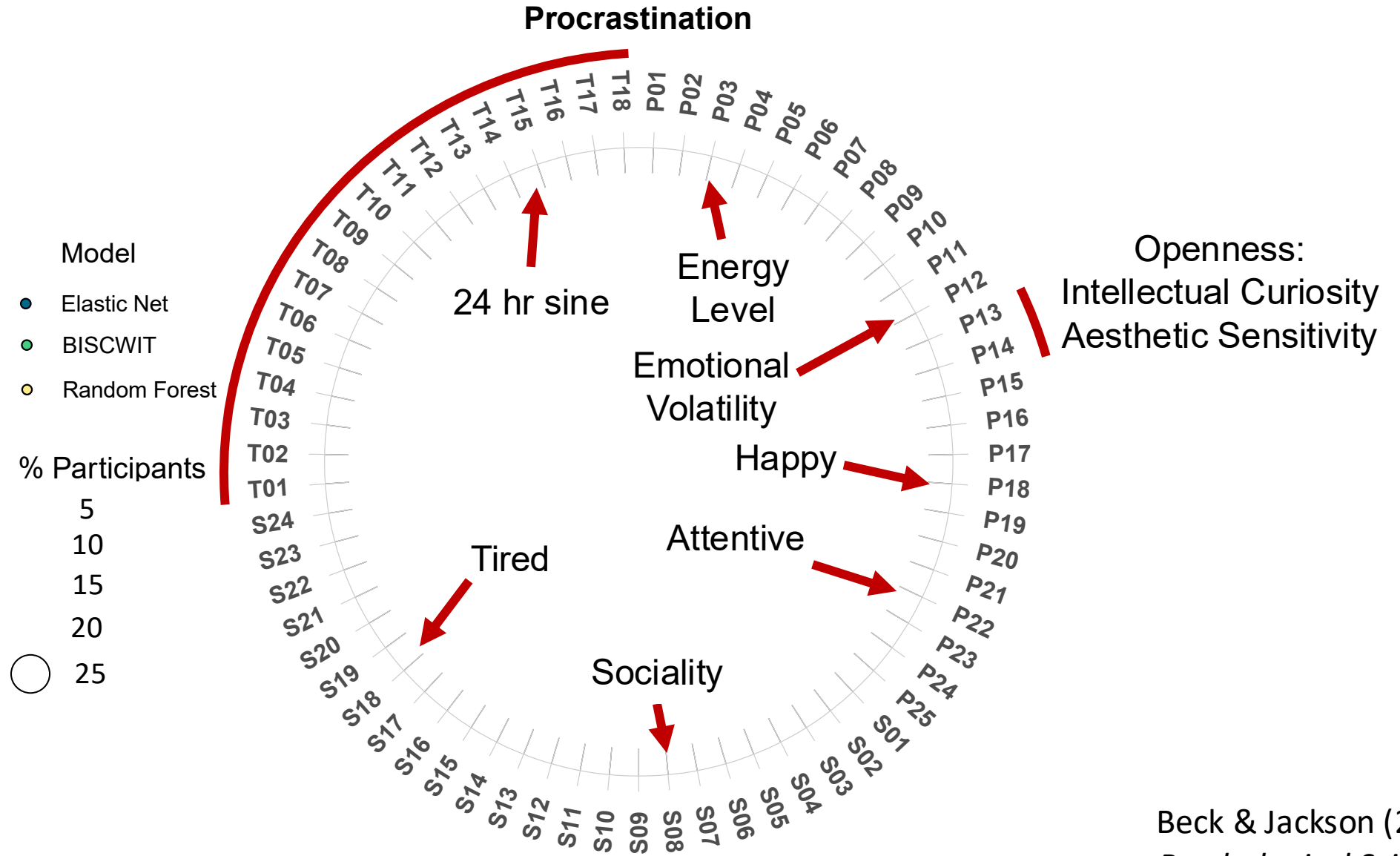


Which features play the strongest roles?

Which features play the strongest roles?



Which features play the strongest roles?



Which features play the strongest roles?

Procrastination

No one feature dominated the prediction of any outcome (max ~35%).

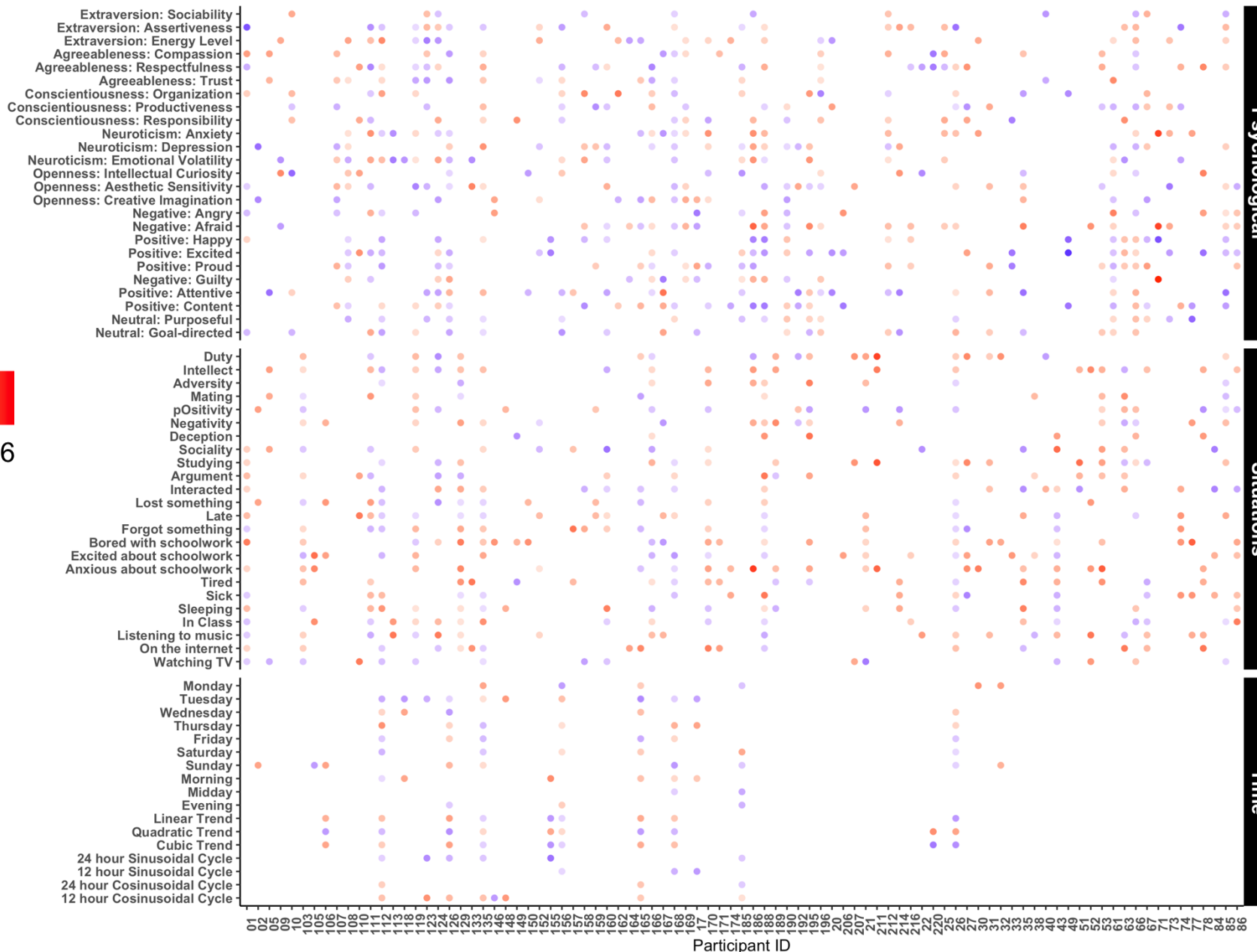
Behaviors & experiences have unique antecedents.

BISCWIT Predicting Future Procrastinating Using Best Accuracy Models

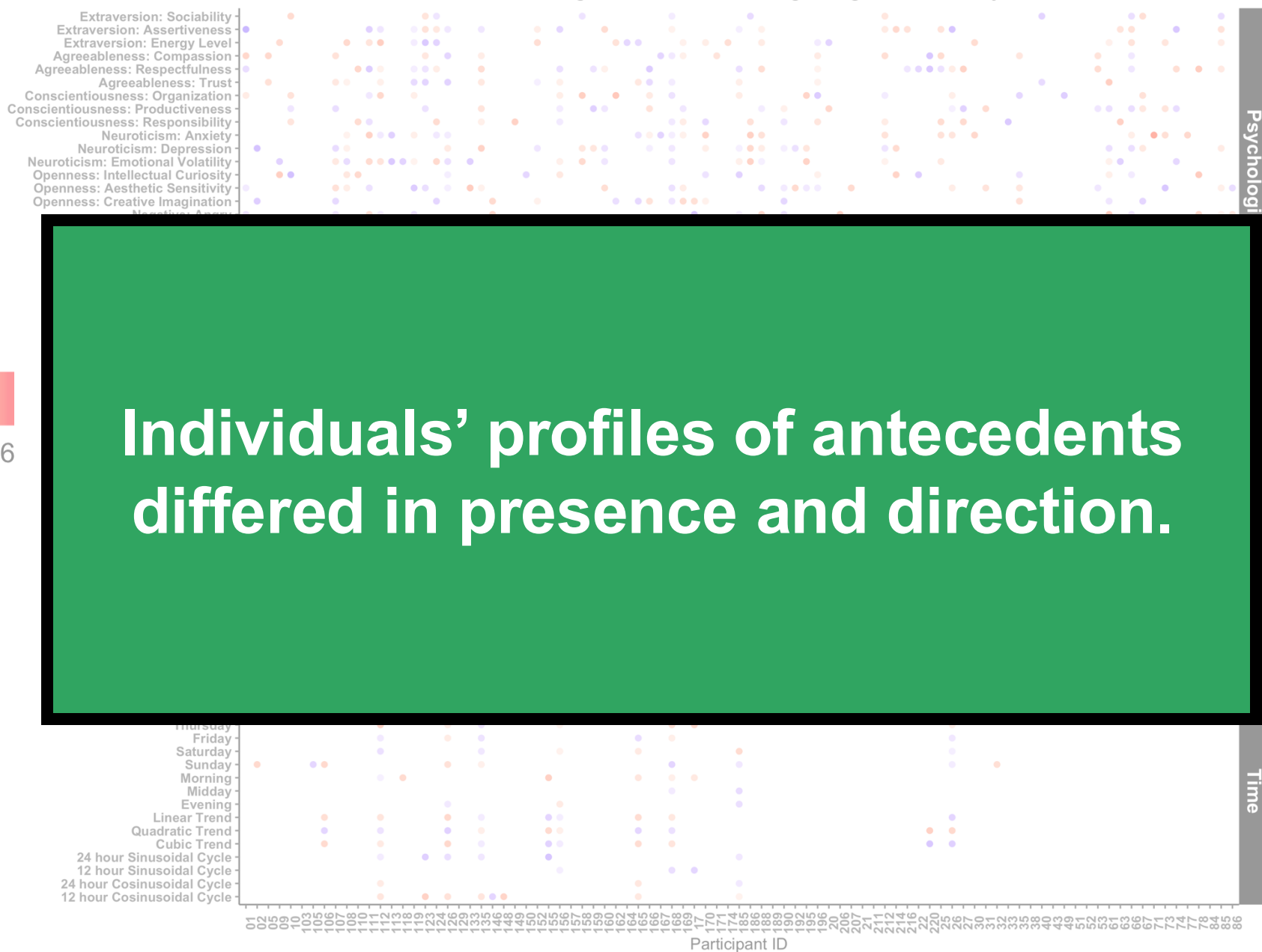
Coefficient



-0.3 0.0 0.3 0.6



BISCWIT Predicting Future Procrastinating Using Best Accuracy Models



Interim Summary

1

We can accurately predict momentary behaviors and experiences

2

The degree to which person or situation factors matter more varies across people

3

Specific antecedents also vary greatly across people

Persons-in-Contexts Proposal 4:

Understanding a person in their own context requires using their language and making them a stakeholder.

What are we missing when we use the same measures for everyone?

Content

Hypothesis: People will generate content that doesn't overlap with the Big Five or other typical shared indicators we measure.

Variability

Hypothesis: People will show more variability and use the full scale more for unique items than shared items, on average.

Predictive Utility

Hypothesis: Unique items will improve predictive utility and play important roles in personalized prediction models.

What are we missing when we use the same measures for everyone?

Content: Capturing Cardinal States

Structure and Mood

- good mood
- keep school life balance
- scheduled time
- focus
- stay on track
- consistent routine
- unstructured time
- skipped breakfast impacts mood
- burnt out
- sleep later

Context and Time

- Chemistry Lab
- Craft Center
- Thursdays
- Ceramics
- Sculpture
- Glassblowing
- Chinese
- American
- Creative
- After Learning
- 6:30
- energy
- after three

Identity, Time, Context, and Behaviors

- Japanese
- Stressful
- Free time
- Library
- Studying
- Distracted
- Gym
- Fun topic
- Anime
- Friends

Ongoing Persons-in-Context Work



Adam Nissen

Well-being of sexual and gender minorities in every life with a focus on positive experiences



Winkie Ma

Narcissism in everyday life, including unique triggers and short- and long-term consequences



Colin Lee

Person-specific personality state profiles and dynamic systems



Evan Warfel

Text-based analysis and merging qualitative and quantitative methods



Anabel Büchner

Dynamic systems, personality as attractors, machine learning

Persons-in-Contexts Proposal 5:

Capturing a person in context provides a fruitful starting point for tailored interventions.

Precision Medicine

Targeting

Traits predict long-term outcomes
(Beck & Jackson, 2022)

Tailoring

**Psychological and situational
phenomena predict behaviors
differently across people.**
(Beck & Jackson, 2023)

Precision Medicine

Targeting

Traits predict long-term outcomes
(Beck & Jackson, 2021a, *JPSP*)

Tailoring

**Psychological and situational phenomena
predict behaviors differently across
people.**
(Beck & Jackson 2023)

Tailoring: Identifying antecedents & providing personalized solutions



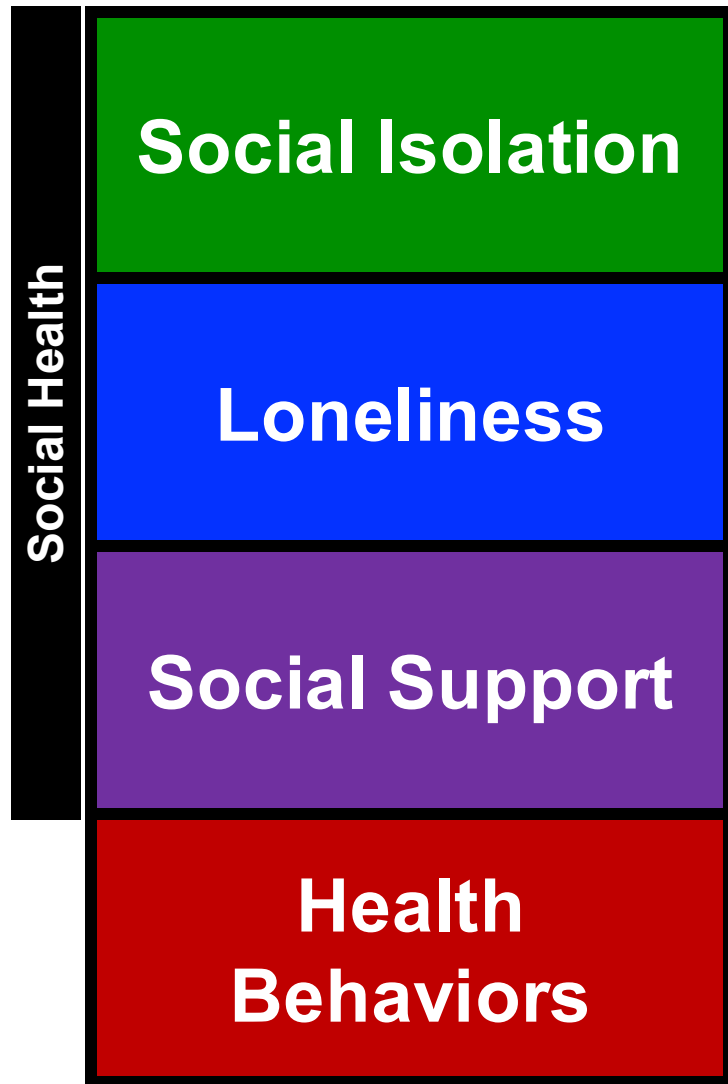
Dementia Diagnosis

Tailoring: Identifying antecedents & providing personalized solutions



Dementia Diagnosis

Tailoring: Identifying antecedents & providing personalized solutions

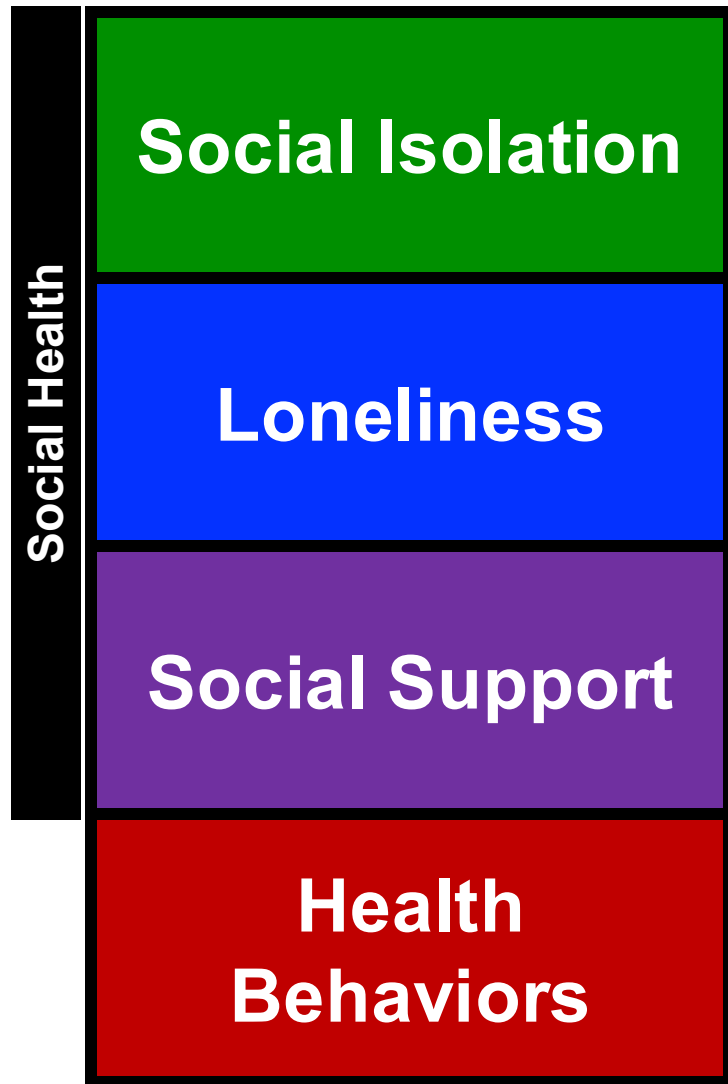


Cognitive Functioning



Dementia Diagnosis

Tailoring: Identifying antecedents & providing personalized solutions

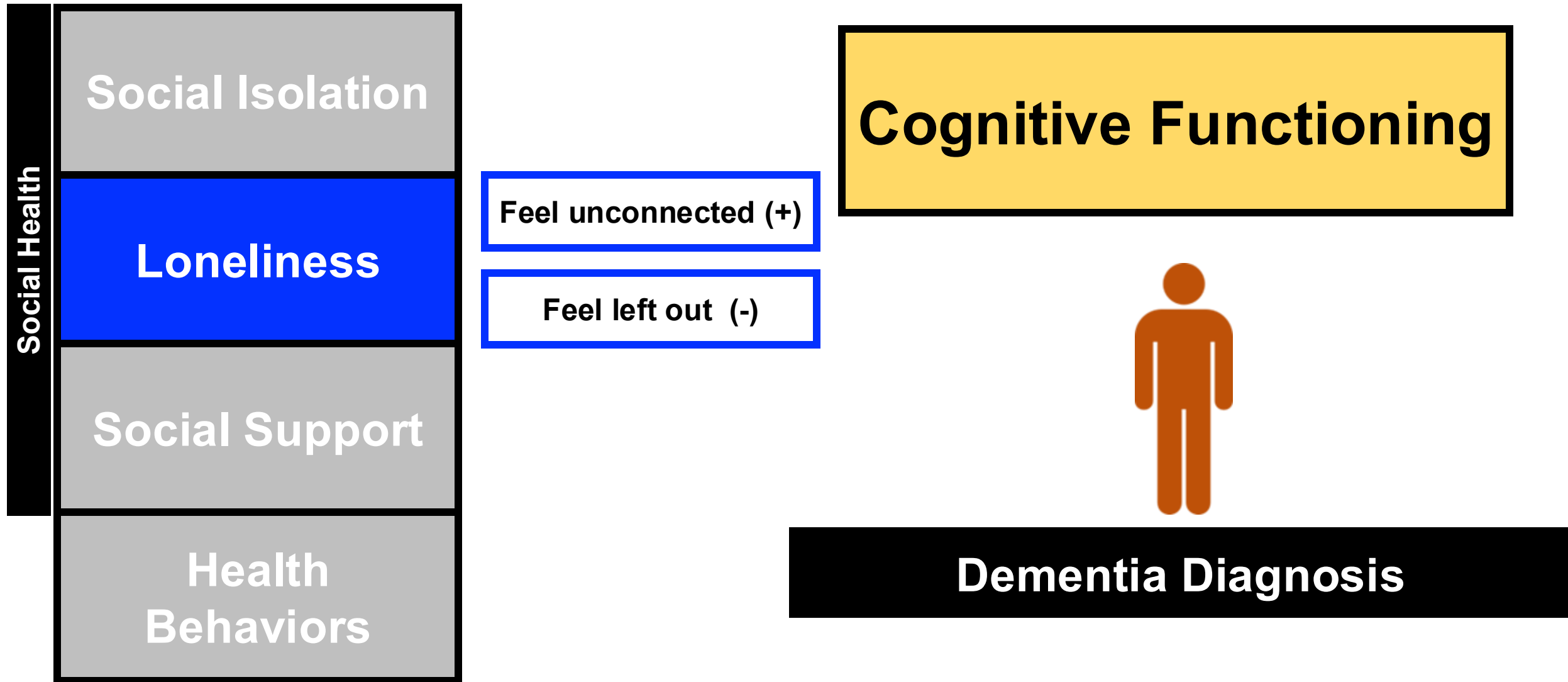


Cognitive Functioning

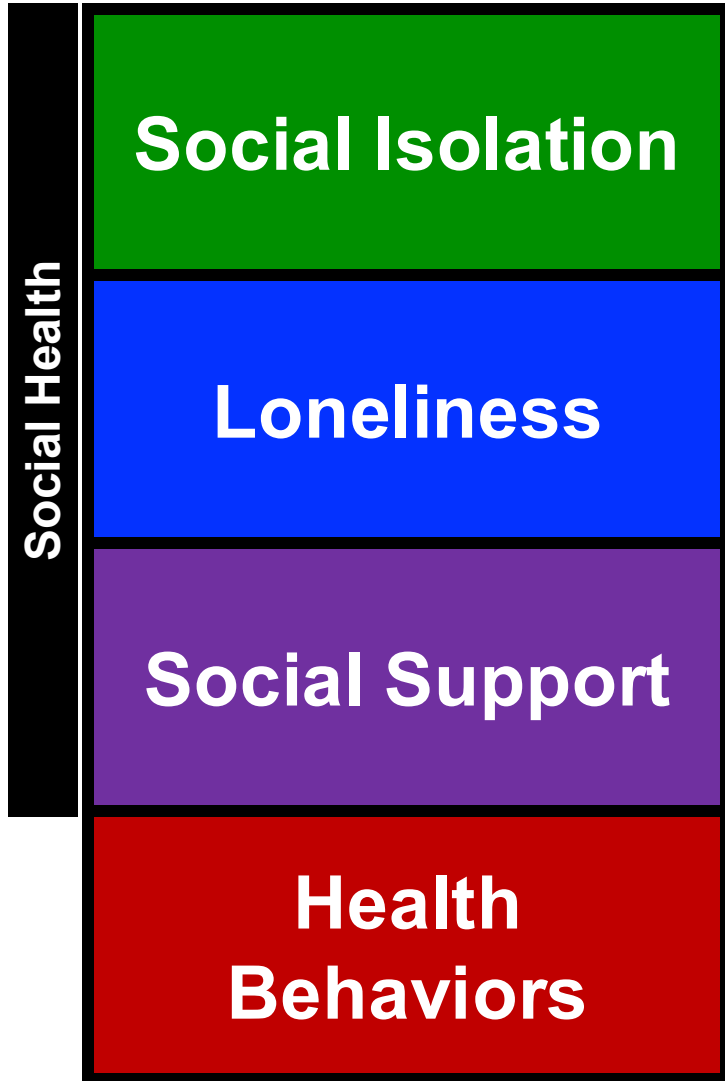


Dementia Diagnosis

Tailoring: Identifying antecedents & providing personalized solutions



Tailoring: Identifying antecedents & providing personalized solutions

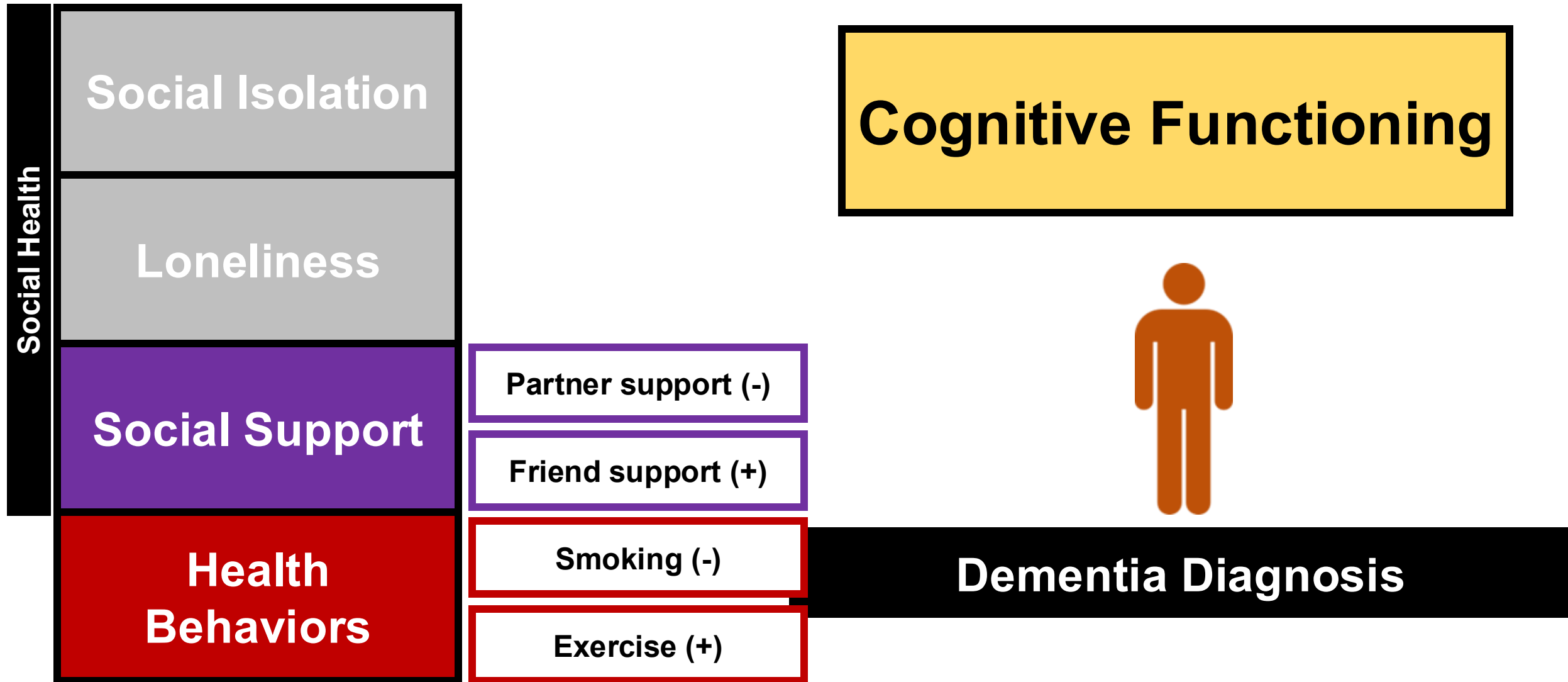


Cognitive Functioning



Dementia Diagnosis

Tailoring: Identifying antecedents & providing personalized solutions



Summary

1

People are not context-free, and we can't study them like they are

2

Psychological theory testing may be better served by asking *for whom?*

3

The question of persons v. situations is less useful than when and for whom

4

Progress in psychological measurement will require collaborations among different stakeholders

5

Successful psychologically tailored interventions will require understanding a person in the context of *their* life

Thank you!

Lingering Questions

1. Choosing the variables
2. Choosing the time-scale
3. Generalizing across populations (should this even be a goal?)

The What is Personality? Lab



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**My most mysterious
black box algorithms**