



Remote Working Conditions in Spain and their Impact on Physical Well-being and Work Attitudes

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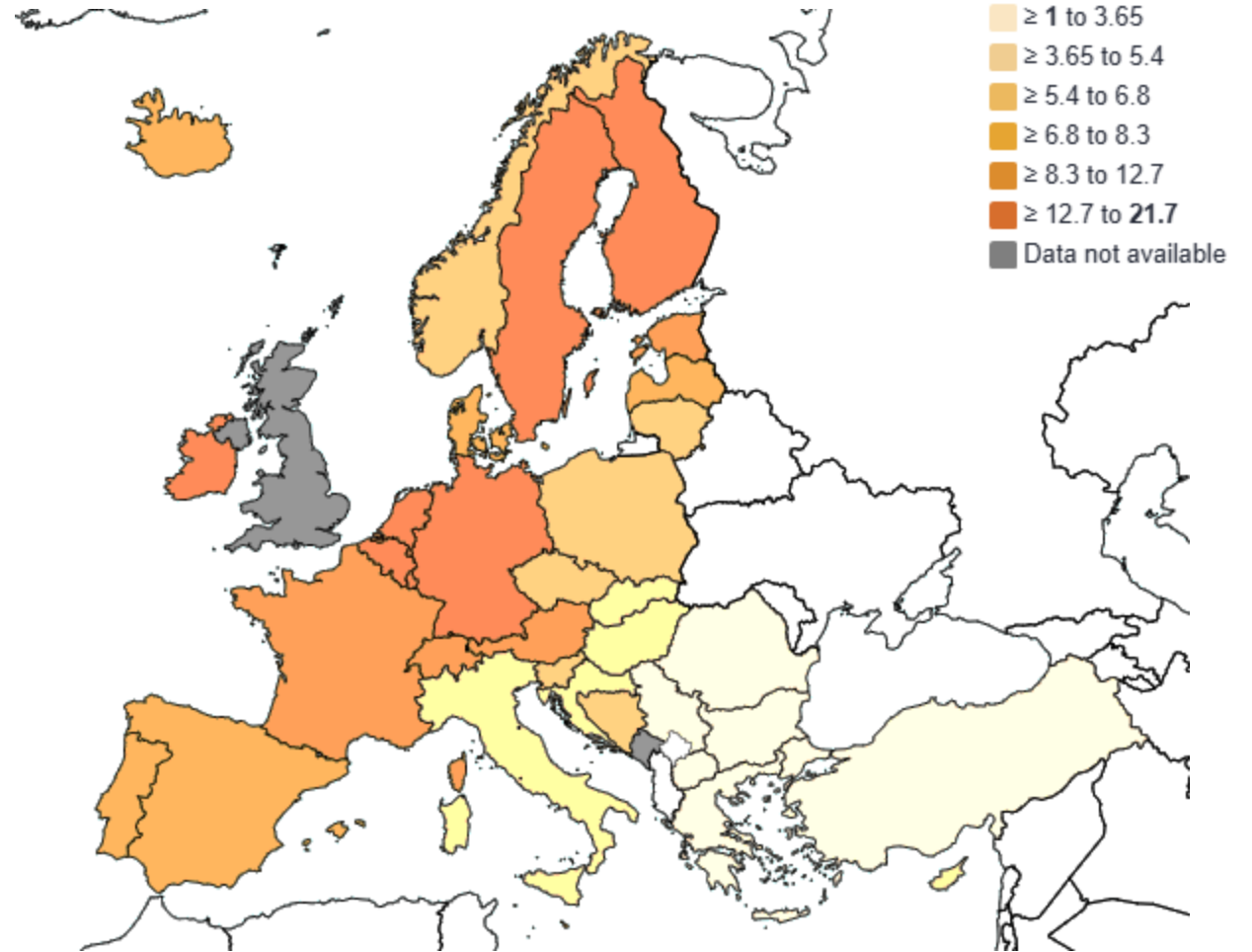


Remote work in Europe

- 2019: **5.4%** of remote workers in Europe (Eurostat, 2026)
- 2020: **12.1%** remote workers (Eurostat, 2026)
- 2023: **8.9%** of the European working force had hybrid arrangements (full & part-time)



- ✓ **21.7%** Finland
- ✓ **7.1%** Spain
- ✓ **1%** Bulgaria



Employed persons working from home by professional status - % of total employment. Eurostat, 2026

What the literature says about remote work (RW)

Remote work has revealed deep-rooted inequalities across Europe (Palomino et al., 2020; Irlacher & Koch, 2021; Stantcheva, 2022)



In Spain, **42.2%** of households lacked a designated workspace, forcing individuals to reorganize their homes to accommodate RW (Cuerdo-Vilches et al., 2021a)



RW settings that fail to address ergonomic or environmental needs can lead to decreased efficiency and physical discomfort (Cuerdo-Vilches et al., 2021)



Remote workers reported an emotional well-being score **15%** higher than those working in traditional office settings (Restrepo & Zeballos, 2023)



Environmental factors (lighting, noise control, ventilation, and air quality) play a crucial role in workers' long-term physical well-being (Felgueiras et al., 2022)



Prolonged sedentary behaviour significantly contributes to musculoskeletal discomfort and chronic pain (Chim & Chen, 2023; Cuerdo-Vilches et al., 2021)

This study

Working from home....



ME



RQ1

To what extent do remote workers in Spain have access to appropriate workstations?

RQ2

How do workspace conditions impact remote workers' physical well-being?

RQ3

To what extent do home workspace conditions affect participants' attitudes toward remote work?

THIS STUDY

Data collection & sample



Data collection

Opt-in online panel, only for mobile devices, December 2025

Tool

Population of
interest

Quotas

Sample used

THIS STUDY

Data collection & sample

web
data
opp

netquest 
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[WebdataVisual](#) (Revilla et al., 2022)

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Adults aged 18 to 65 who had worked from home at least 7 hours per week on average in the past two months

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Adults aged 18 to 65 who had worked from home at least 7 hours per week on average in the past two months

Quotas

Gender + Age

Sample used

A total of 2,326 eligible panelists started the survey, and **1,209** completed it



70+ questions



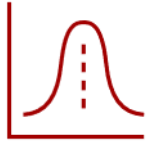
3 requests for photos



Focused on **self-reported** questions

TOPICS

- *Ergonomic conditions*
- *Furniture equipment*
- *Environmental conditions*
- *Health outcomes*
- *Remote work attitudes and future preferences*



RQ1. Descriptive analyses using R



RQ2 & RQ3. Structural Equation Modelling (SEM)

→ Using LISREL (Jöreskog & Sörbom, 1993)

→ Testing: Global fit (CFI 0.95-1.00; RMSEA 0.008- 0.032)
Local fit (JRule)

RQ2:

Musculoskeletal pain
Eye discomfort / Headache

RQ3:

Remote work attitudes

Main results



RQ1: To what extent do remote workers in Spain have access to appropriate workstations?



STRONG ENVIRONMENTAL CONDITIONS

Ventilation: **90%**
Lighting: **88%**
Quietness: **85%**



MODERATE ERGONOMIC SETUP

E. chair: **56%**
E. mouse: **39%**
Lumbar supp: **29%**



LIMITED ERGONOMIC SETUP

Footrest: **13%**
Wrist rest: **22%**
E. keyboard: **21%**

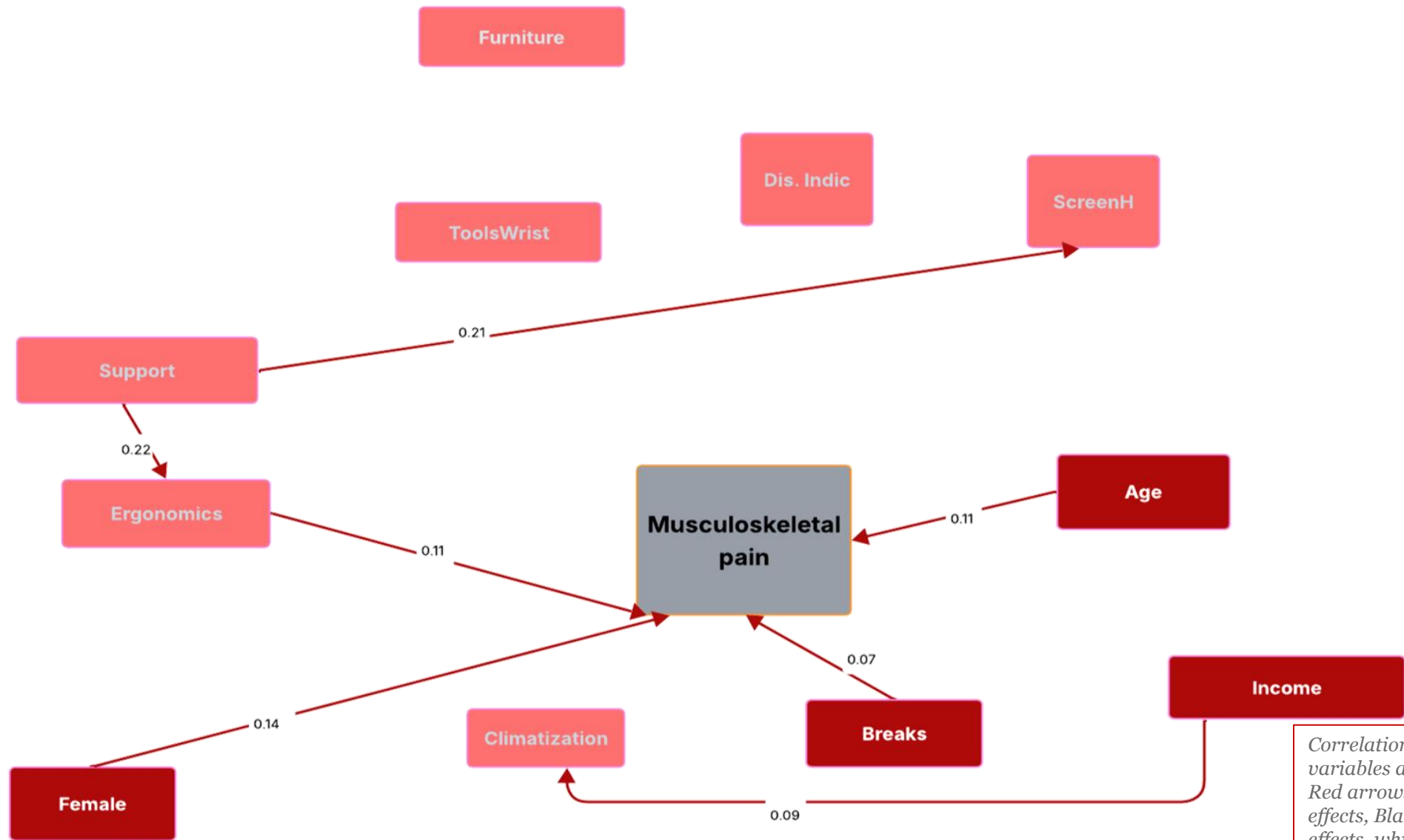


HOUSE CONDITIONS

Dedicated office: **54%**
Non-shared workspace: **84%**

MAIN RESULTS

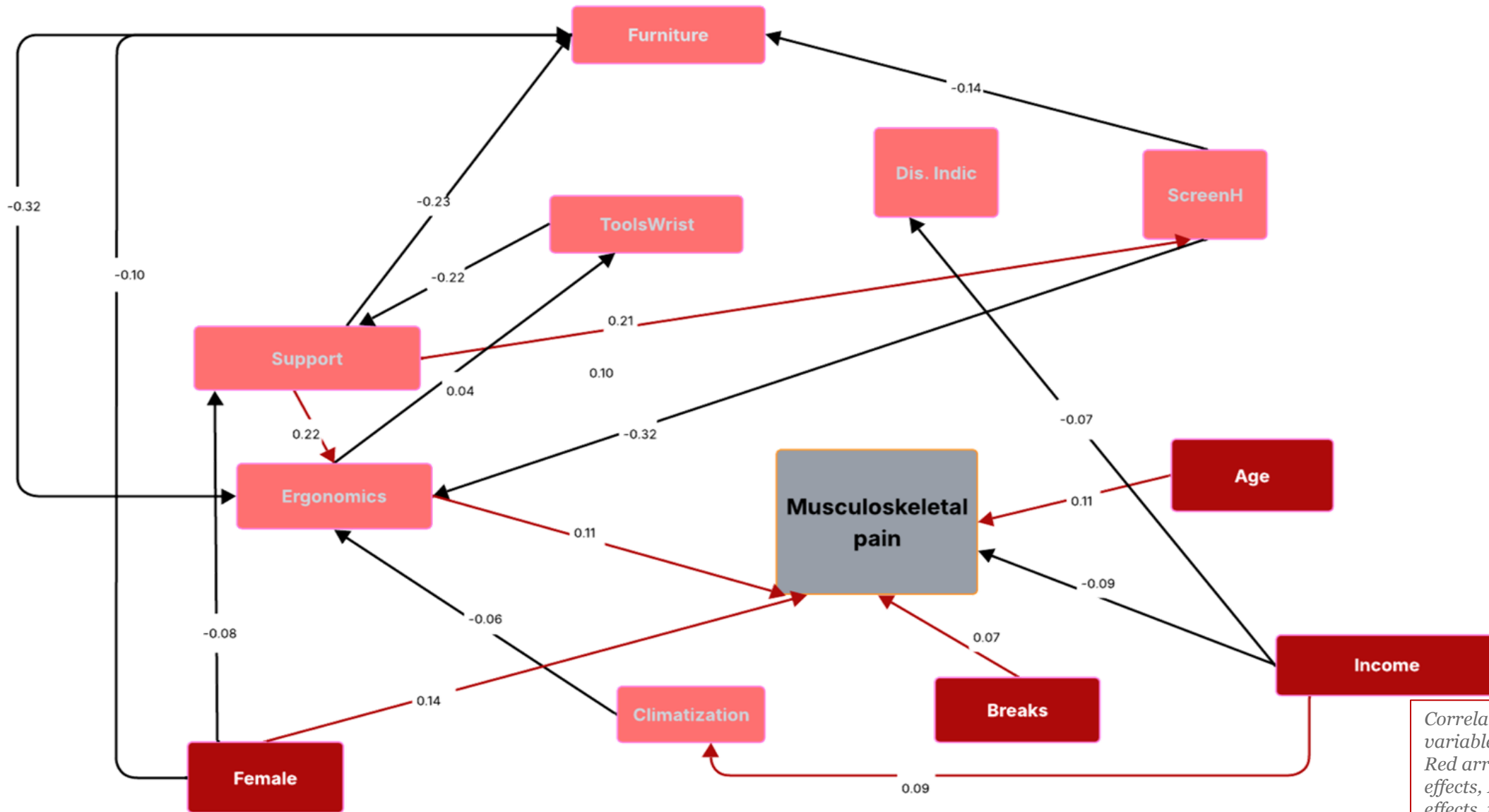
RQ2: How do workspace conditions impact remote workers' physical well-being? – Musculoskeletal Pain



Correlations between the X variables are not represented. Red arrows indicate positive effects, Black arrows negative effects, while grey arrows indicate non significant effects.

MAIN RESULTS

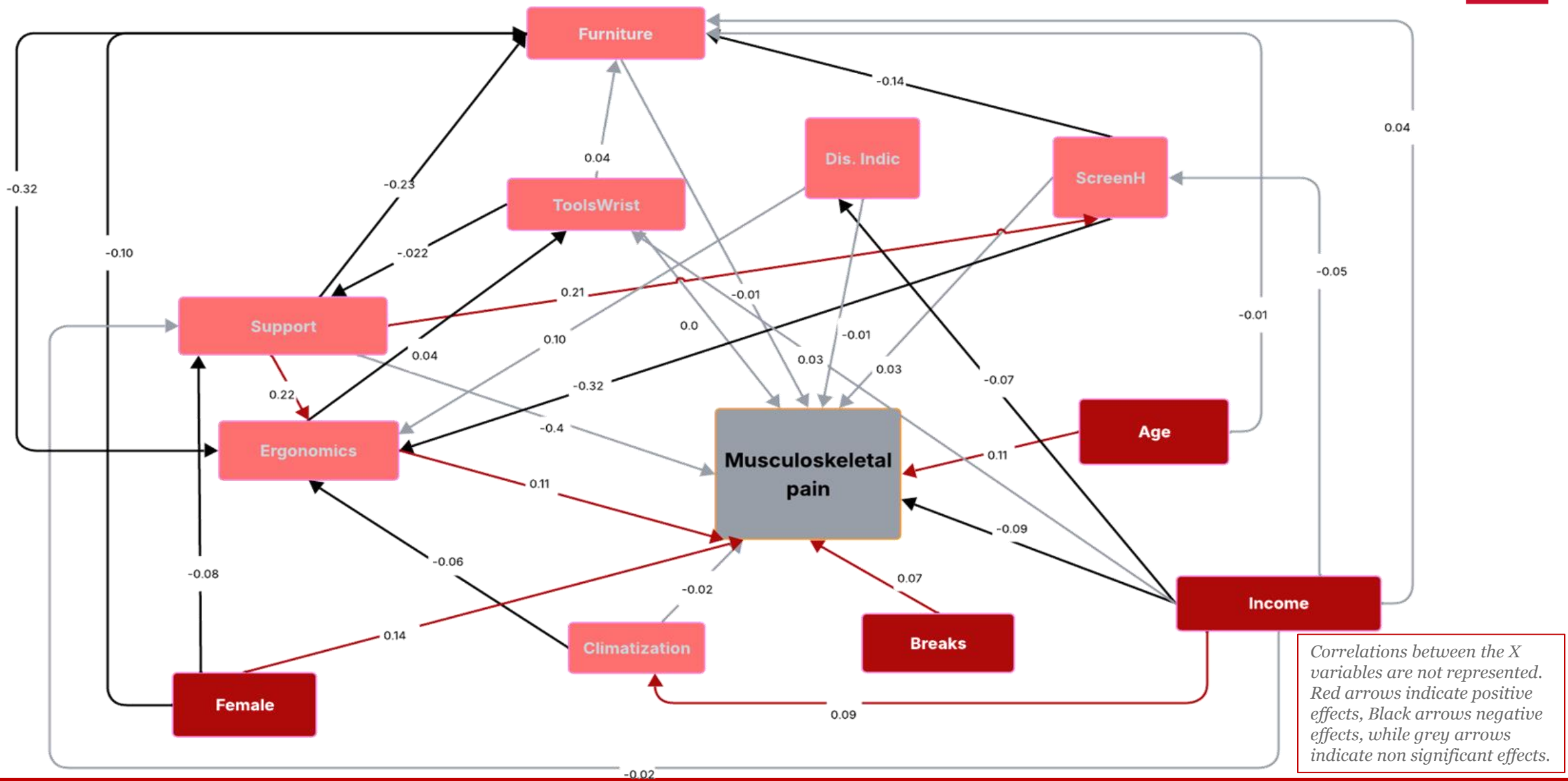
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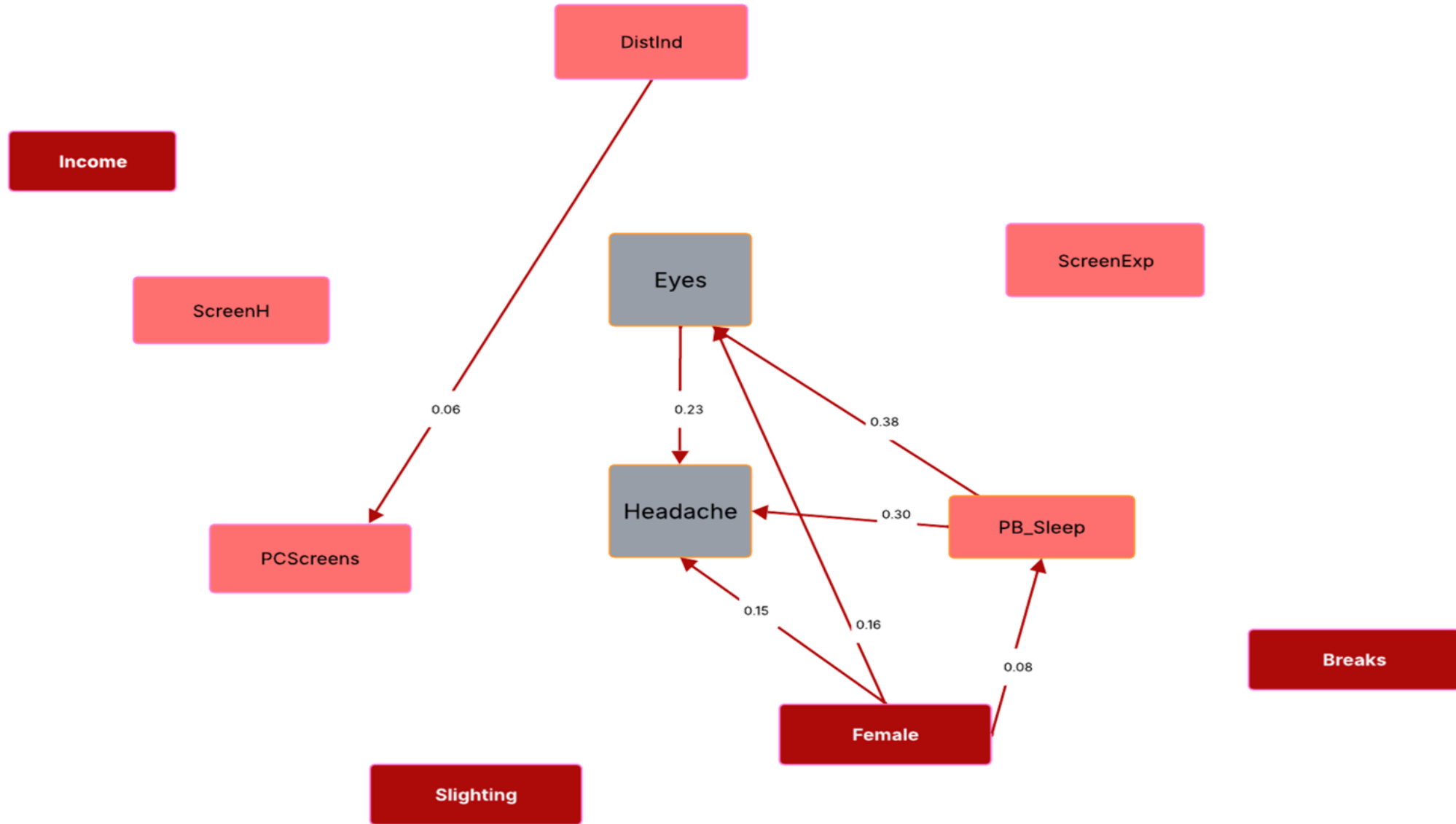
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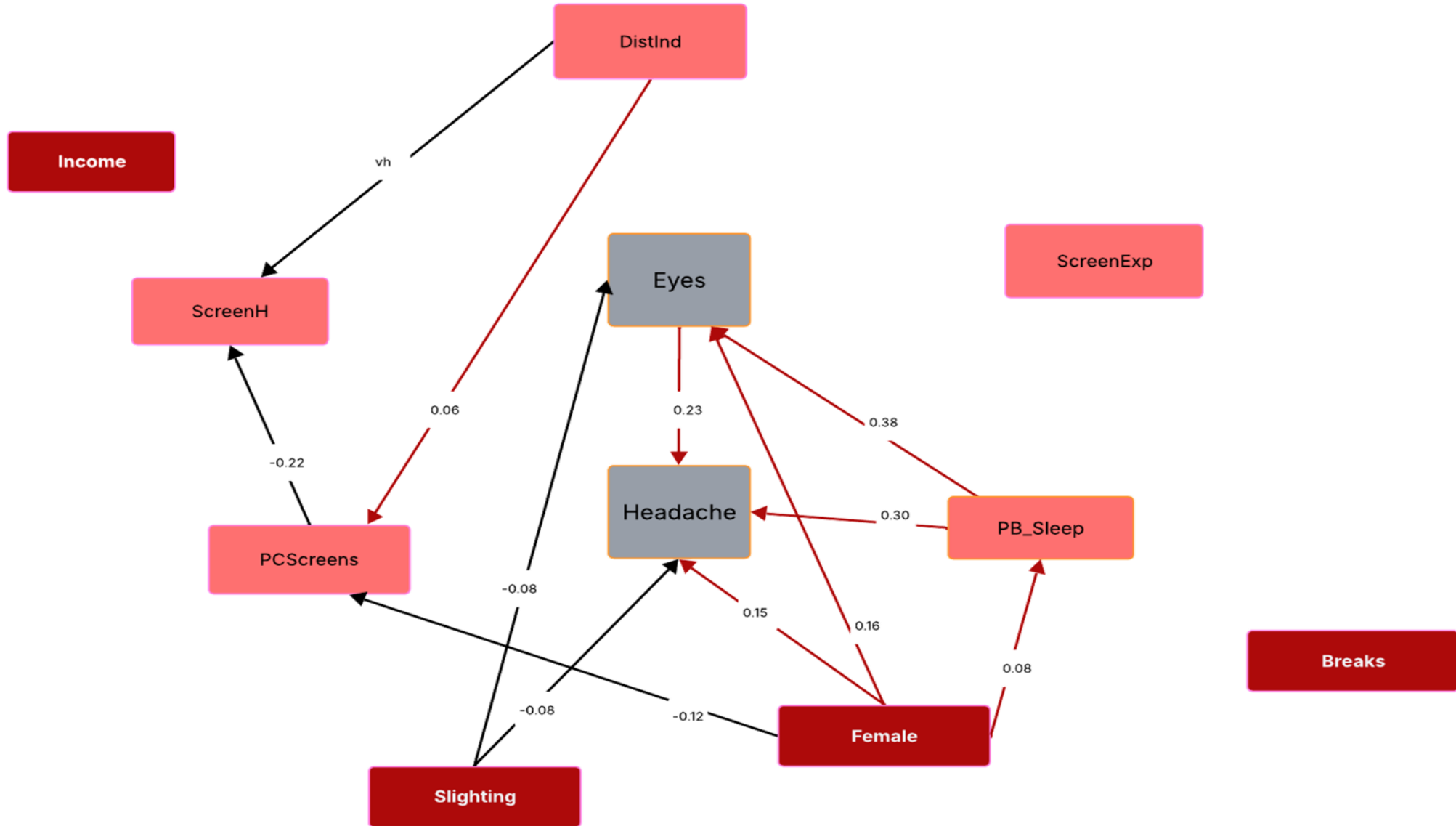
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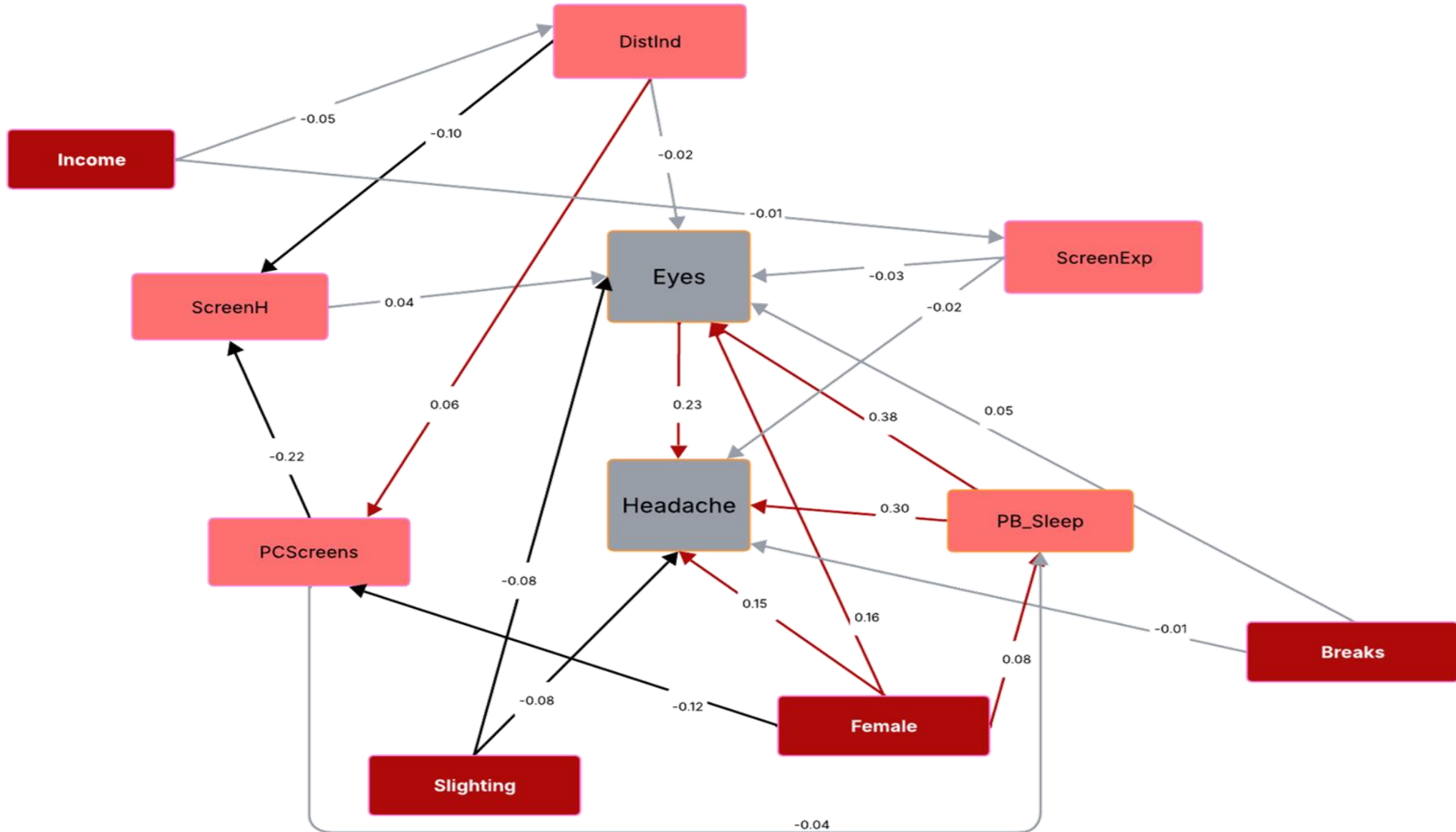
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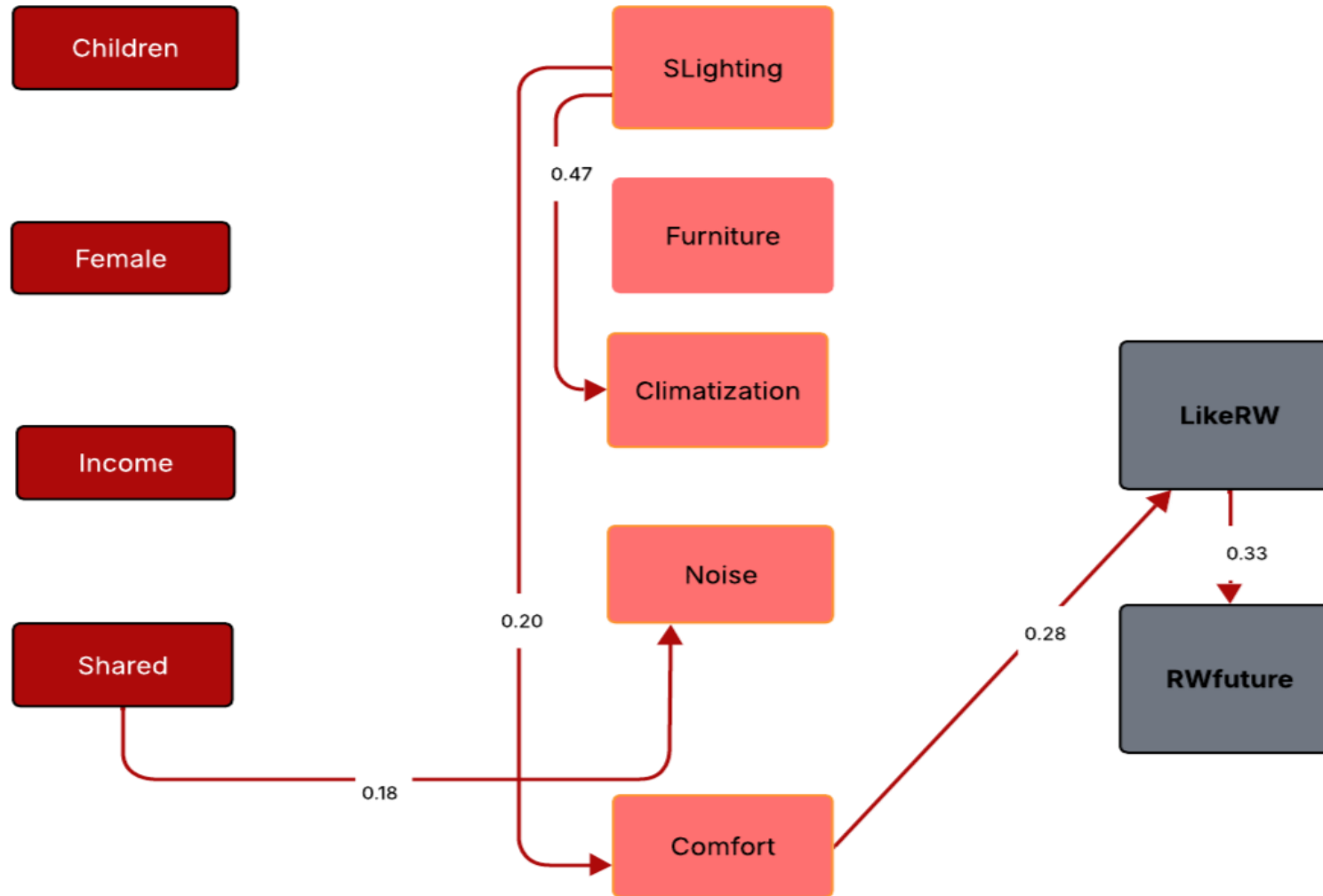


MAIN RESULTS

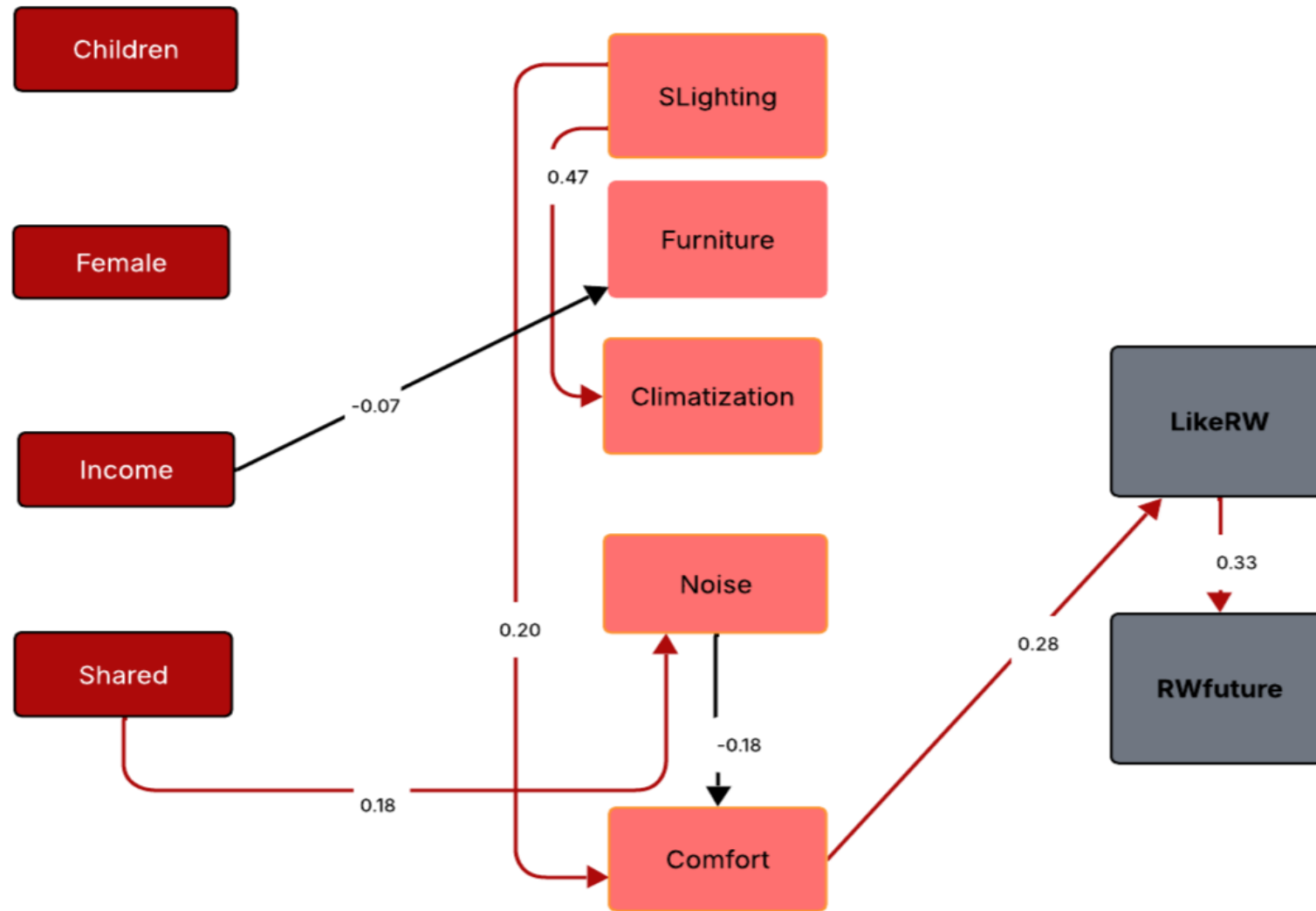
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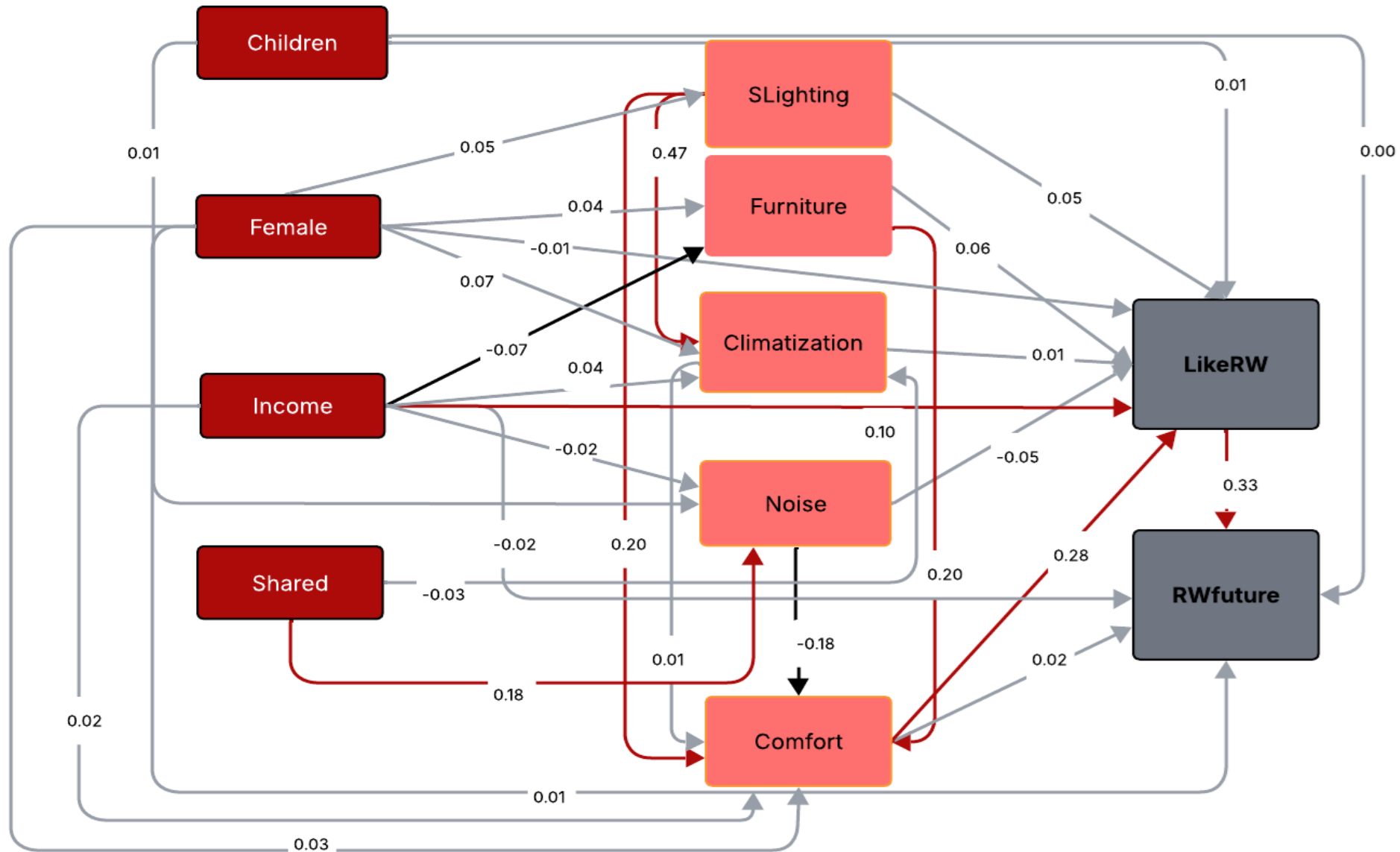
RQ3: To what extent do home workspace conditions affect participants' attitudes toward remote work?



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Conclusions



Workspace conditions matter, but not all factors matter equally

Spanish remote workers generally have access to adequate environmental conditions and basic furniture, but more specialized ergonomic equipment remains relatively uncommon



1. Physical ergonomics are key for musculoskeletal health



2. Eye discomfort is a central pathway to headaches



3. Comfort shapes the future of remote work

What should employers & policymakers learn from this?

1

Ergonomics matters more than equipment ownership

Simply having furniture is not enough; workers need ergonomically adequate workstations



2

Health outcomes are interconnected

Eye discomfort and headaches should be addressed together, considering both workstation characteristics and sleep quality



3

Remote work sustainability depends on workspace quality

Comfortable, quiet, and well-conditioned home workspaces increase satisfaction and support long-term remote work adoption



The quality of the home office is not only a productivity issue: it is also a health and retention issue

Thanks!
Questions?



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<https://www.upf.edu/web/webdataopp>

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Our variables

THIS STUDY

Construct	Operationalization	Interpretation
Musculoskeletal Pain (MSP)	Mean score from 5 pain items (shoulders, hips, arms, knees, legs)	Higher scores = greater pain frequency and spread
Eye discomfort	1–4 frequency scale	Higher scores = more discomfort
Headache	1–4 frequency scale	Higher scores = more frequent headaches
Remote Work Satisfaction	1–5 Likert scale	Higher scores = more positive attitude
Remote Work Future Preference	1–5 Likert scale	Higher scores = preference for increasing RW
Remote Work Hours	Continuous (weekly hours)	Greater exposure to RW

Several variables were recoded into ergonomic adequacy indicators to facilitate SEM interpretation.

Our variables

THIS STUDY

Construct	Operationalization	Higher scores indicate
Ergonomics/Posture	Mean score from 6 ergonomic items	Better ergonomic conditions
Furniture adequacy	Recoded 0–2 (inadequate to adequate)	Better ergonomic furniture
Support devices	Mean presence of ergonomic accessories	More ergonomic support
Lighting	Combined sufficiency + light source score	Better lighting quality
Climatization	Recoded 0–2 adequacy score	Better temperature regulation
Ventilation	1–5 scale	Better ventilation
Noise	1–5 scale	Higher noise levels
Screen position	Height + distance adequacy	Better monitor positioning
Break frequency	Recoded 0–2	More frequent breaks
Screen Exposure	RW hours × % screen use	Total weekly screen exposure

Model fit assessment

Model	χ^2 (df)	p-value	RMSEA	CFI	SRMR	GFI	Fit Assessment
Eyes– Headache	74.99 (38)	0.00032	0.032	0.95	0.037	0.99	Good
Musculoskeletal Pain	67.22 (37)	0.00173	0.029	0.96	0.031	0.99	Good
Remote Work Future	22.41 (21)	0.37613	0.008	1.00	0.019	1.00	Excellent

Recommended thresholds: RMSEA < 0.05 = Good
 CFI > 0.95 = Good
 SRMR < 0.08 = Good
 GFI > 0.95 = Good

Model fit assessment

Model	Initial CFI	Final CFI	Initial RMSEA	Final RMSEA
Eyes– Headache	0.69	0.95	0.74	0.032
Musculoskel etal Pain	0.81	0.96	0.059	0.029
Remote Work Future	0.90	1.00	0.052	0.008

Recommended thresholds: RMSEA < 0.05 = Good
CFI > 0.95 = Good