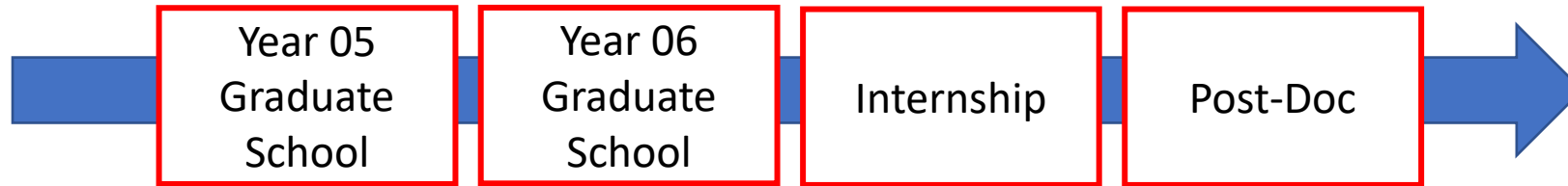


Delainey Wescott, MS
Graduate Student, Clinical-Health
Psychology, Quant minor
Mentor: Dr. Kathryn Roecklein
Extended family of mentors 😊
Dr. Peter Franzen, Dr. Brant Hasler,
Dr. Adriane Soehner, Dr. Meredith Wallace,
& Dr. Tica Hall

Goal Rubric



Skills: Pre-registration, manipulation/tx analyses (CARRS/MoLT)

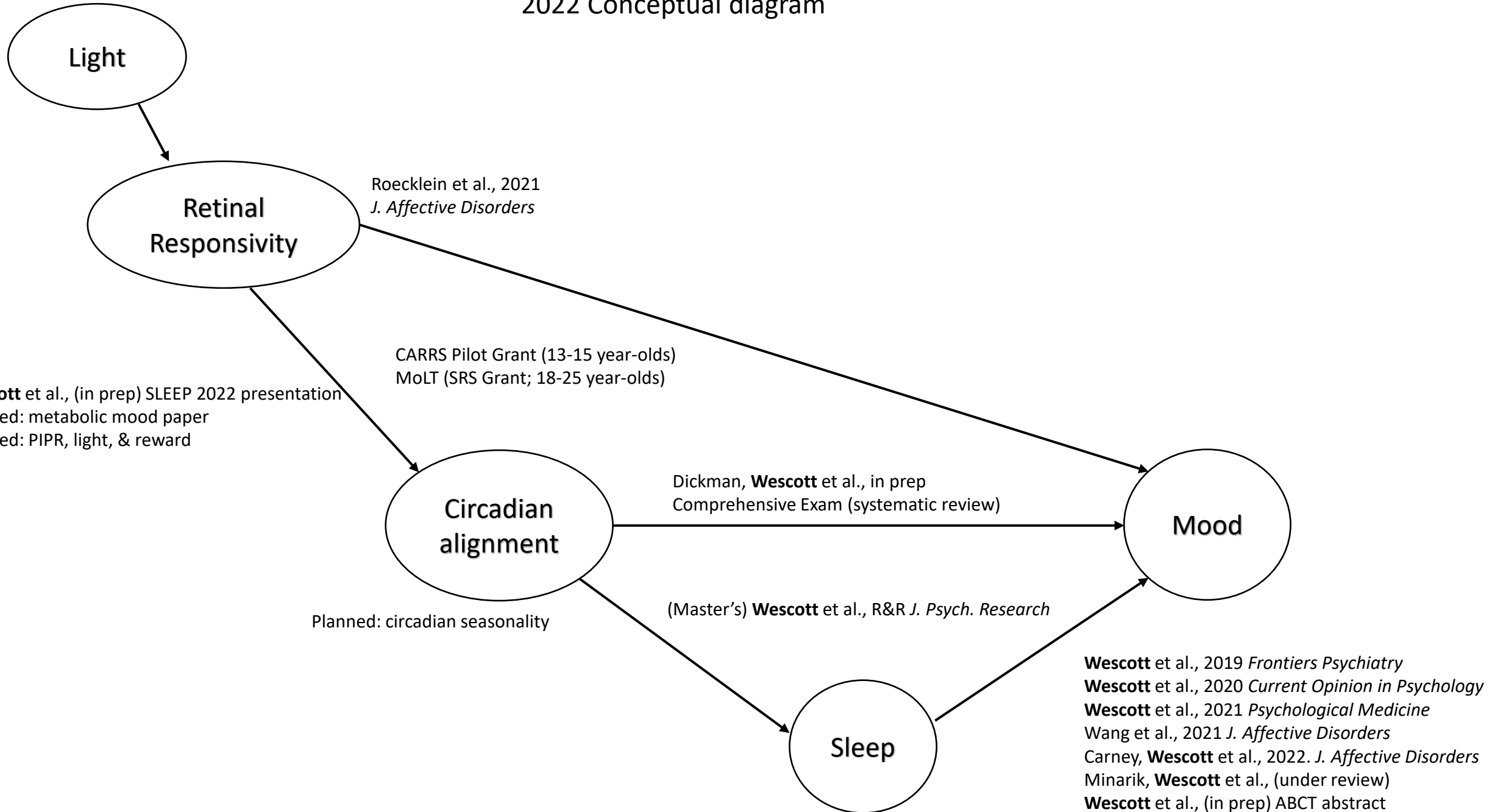
Manuscripts: Sleep & PIPR, ABCT poster, metabolic mood

Conference Presentations: *Accepted:* CSCS talk, ABCT poster; *To submit:* ASCS, SLEEP, SRBR

Grant Applications: NRSA (F31)

Job Application Process: Continue to seek out diverse career models.

2022 Conceptual diagram



Delainey Wescott, MS
 Graduate Student, Clinical-Health Psychology
 Mentor: Dr. Kathryn Roecklein

Goal Rubric

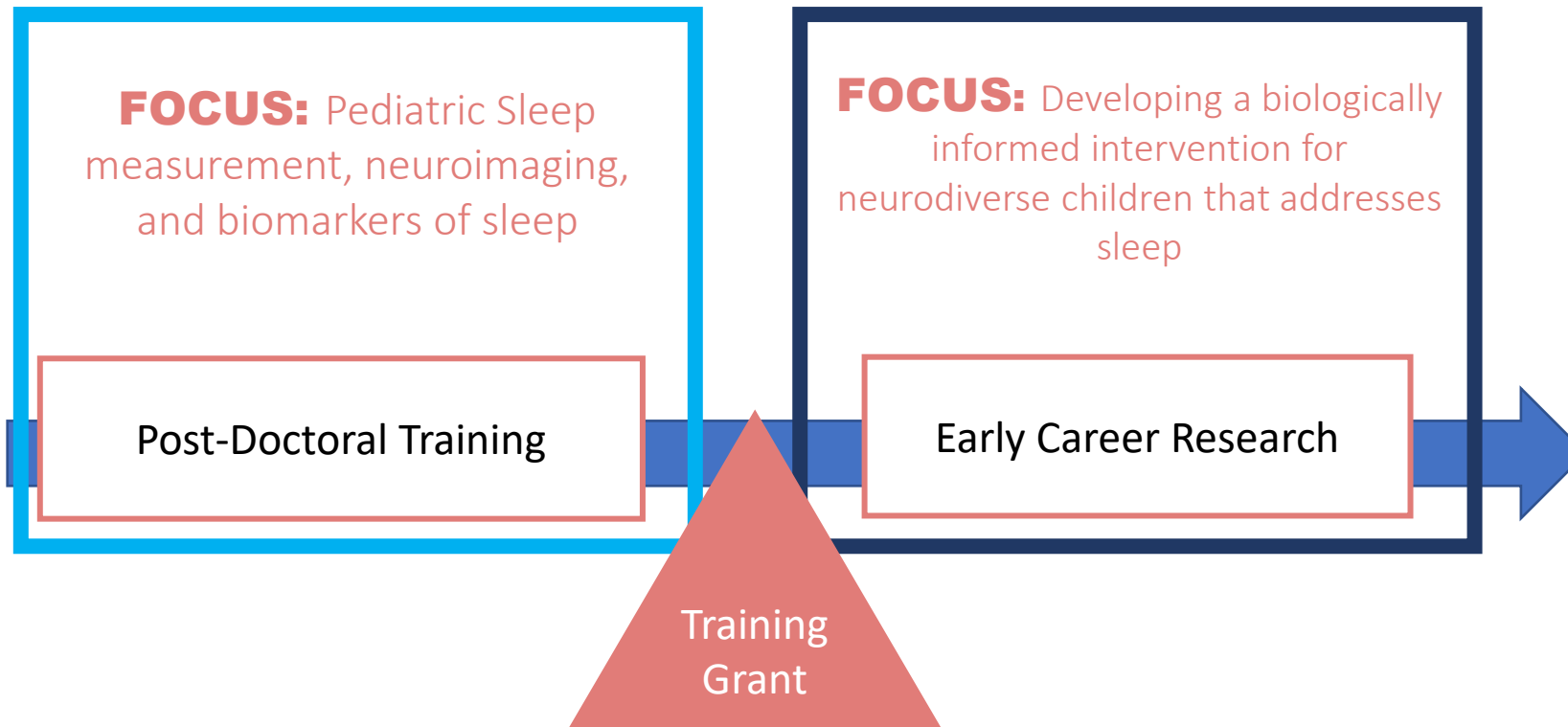
Year	Fall	Spring	Summer
5	Defend comps Sleep & PIPR paper/ASCS submit ABCT Sleep SIG poster/paper CSCS Research day presentation CARRS pilot study MoLT study Teaching presentation CAP externship	Propose dissertation F31 application April 8 th CARRS pilot study MoLT study Clinical assessments Metabolic mood paper Submit comps paper	Prep for internship applications CARRS pilot study MoLT study
6	Apply for internship CARRS pilot study Prelim dissertation data SLEEP?	Internship interviews CARRS pilot study	Defend dissertation Move for Internship!

Goals and Models

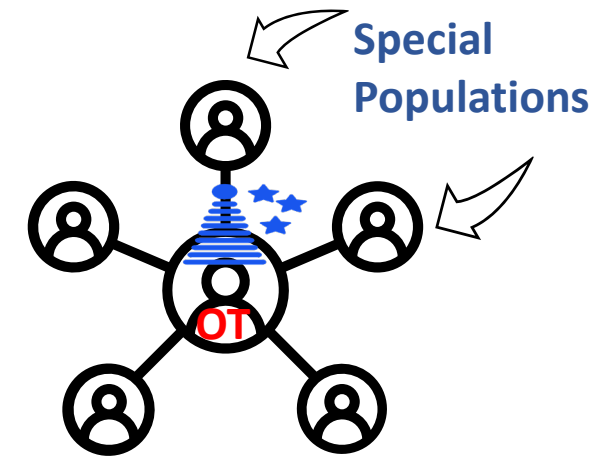
Amy Hartman, PhD
Post-Doctoral Scholar
Center for Sleep and Circadian Science
Mentors: Adriane Soehner, Stefanie Bodison

Job Goal: Tenure-Track, teaching and research position

Dept: Occupational Therapy/
Rehabilitation Sciences

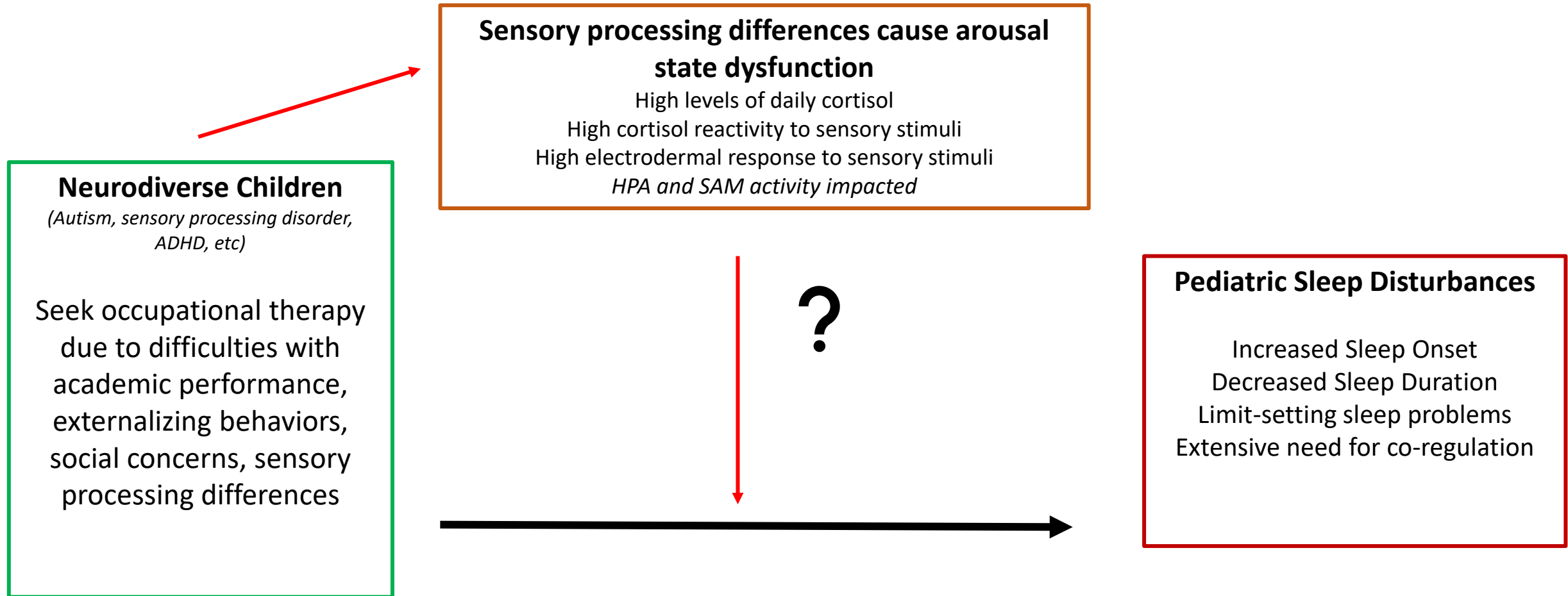


R1/2 University



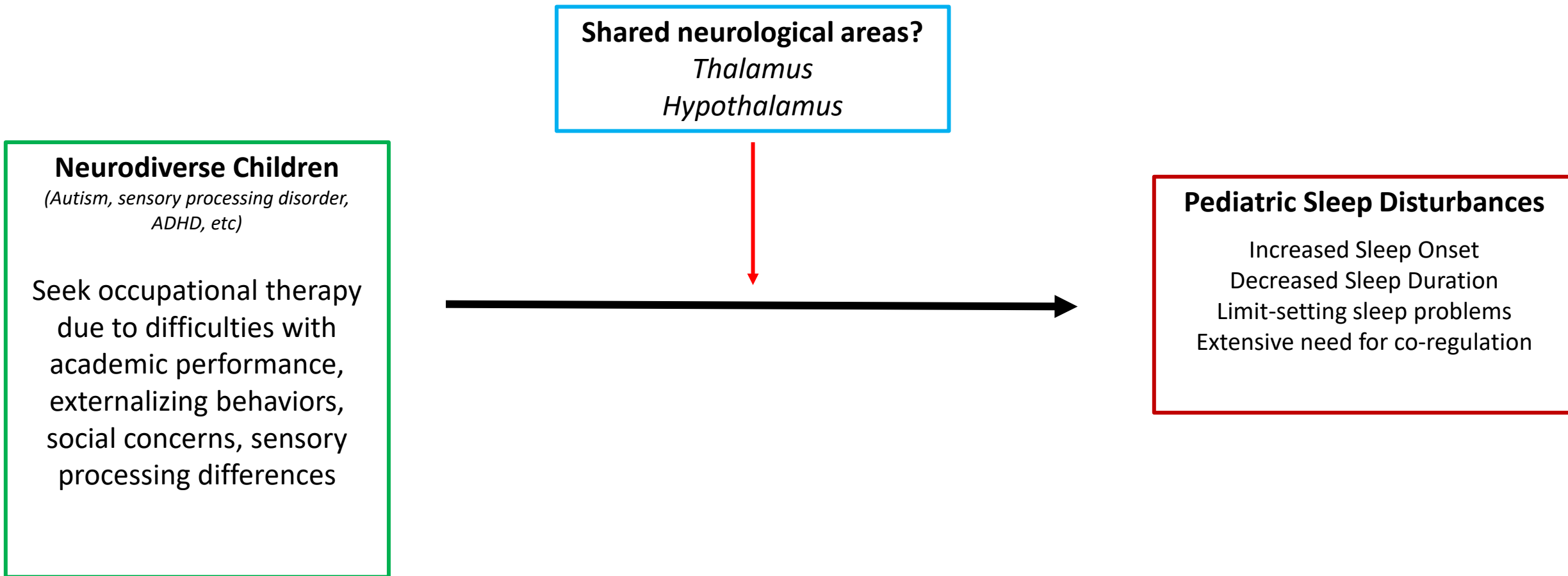
Conceptual Model Goal Planning Rubric

First line of research: To what extent do arousal state dysfunctions explain sleep difficulties neurodiverse children experience?



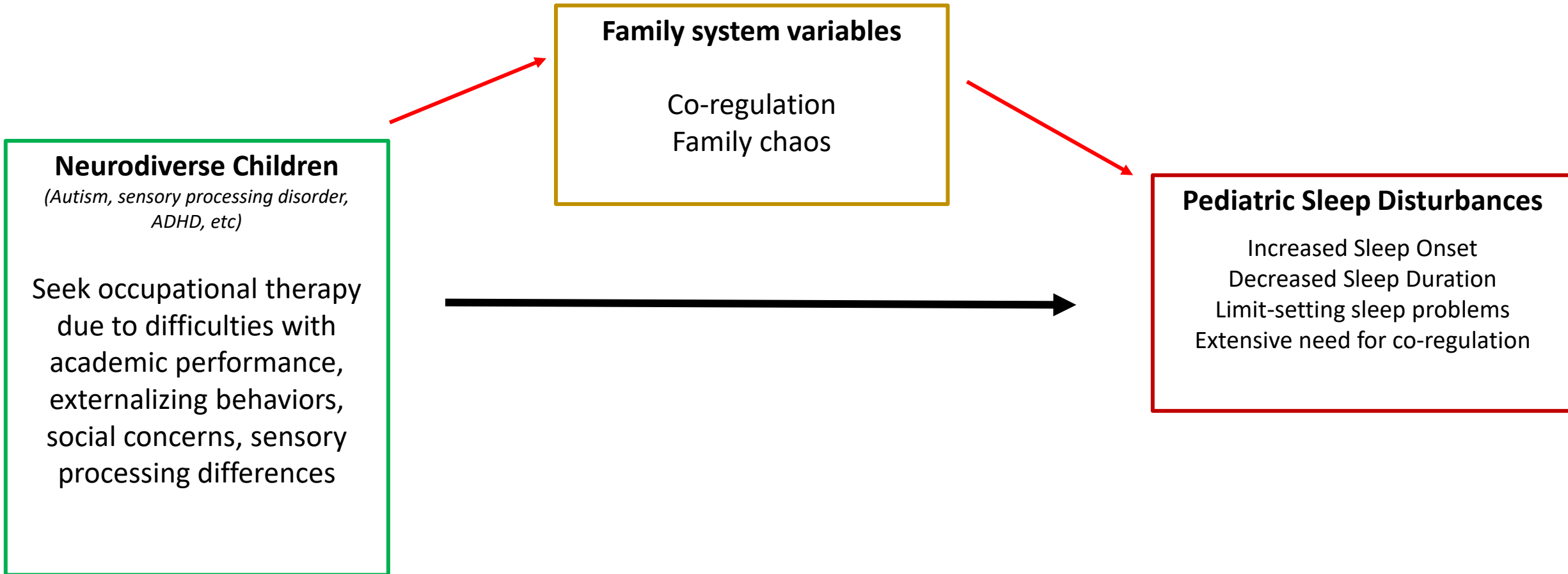
Conceptual Model Goal Planning Rubric

First line of research: To what extent do differences in neurological areas explain sleep difficulties neurodiverse children experience?



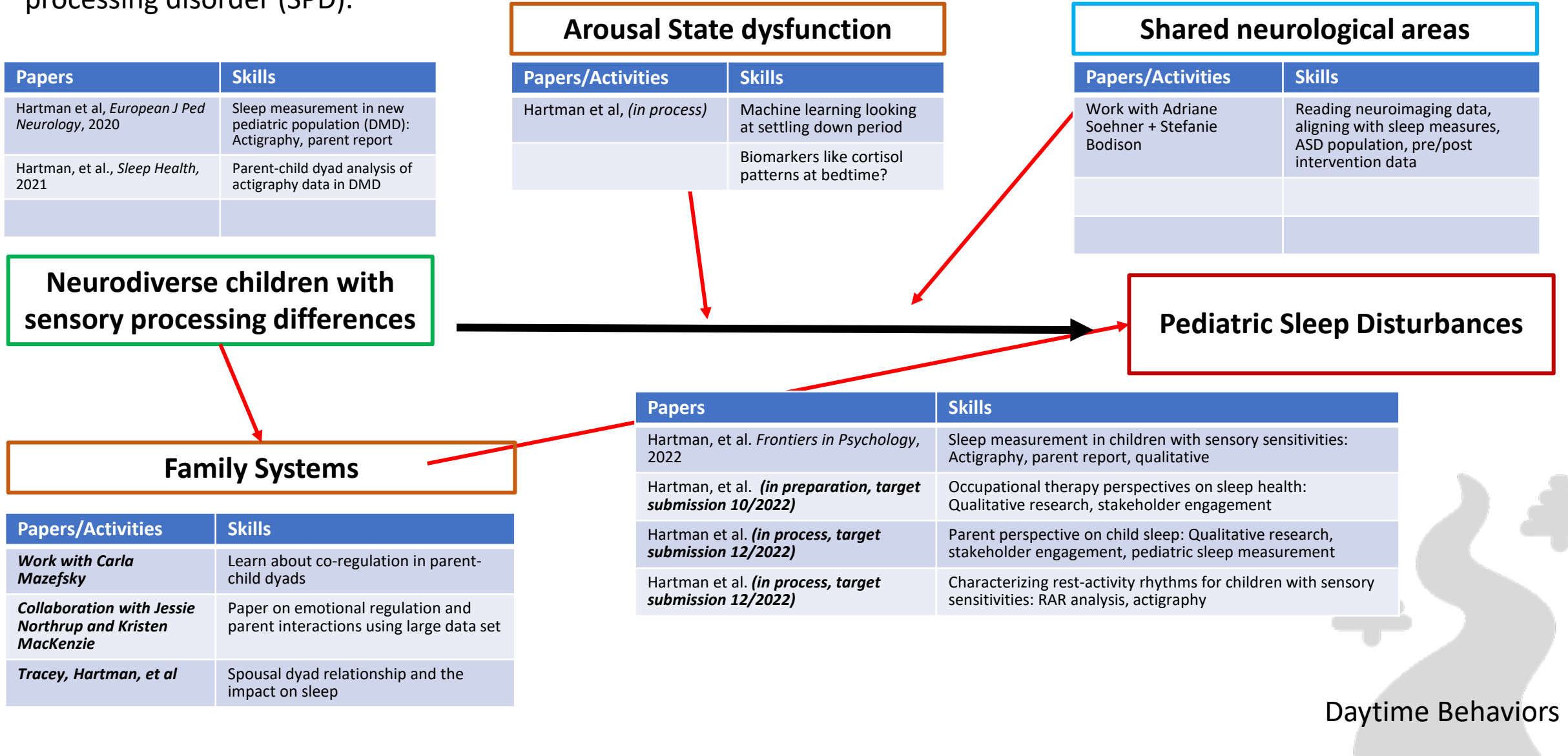
Conceptual Model Goal Planning Rubric

First line of research: To what extent do family system characteristics (co-regulation, family chaos to start) mediate sleep difficulties? Could these areas be targets for intervention?



Conceptual Model Goal Planning Rubric

Grand Goal: To identify the impact of disturbed sleep on sensory processing abilities in children with sensory processing disorder (SPD).



Short term goals

Neurodiverse children have higher rates of sleep problems but sleep intervention is not part of routine care.

Driving Research Gap:

Limited knowledge of why sleep is impacted.

We don't know where the breakdown is in intervening and what specifically is difficult for neurodiverse children.

Could routine care be impacting sleep without knowing it?

Post-doctoral year(s)

Examine neural correlates of sleep for autistic children

Publish on **stakeholder engagement** completed in dissertation.

Examine if the areas identified by caregivers is correctly measured by our outcome measures.

Feasibility trial: sleep measurement as part of a sensory integration intervention for autistic children with neuroimaging

Training Grant Ideas

Gain further training on outcome measures of arousal systems

Trial a data collection method that captures multidimensional sleep health & arousal level changes to drive neuro-informed intervention.

Goal Rubric & Conceptual Model 2022-2023

Caitlin Ann Cheruka, MS., ACSM-CEP, RYT-200

PhD Goal Rubric

2022-2023

Caitlin Ann Cheruka, MS, ACSM-CEP, RYT-200

Doctoral Student Scholar

Mentors: Dr. Christopher E. Kline

DOCTORAL STUDENT 4TH
YEAR

QUARTER 1
(JULY- SEPTEMBER)

QUARTER 2
(OCTOBER-
DECEMBER)

QUARTER 3
(JANUARY-
MARCH)

QUARTER 4
(APRIL- JUNE)

Doctorate Milestones

Oral comprehensive exam
Submit committee form
Writing chapters 1-3

Dissertation overview
IRB approval
Begin recruitment / data collection

Data collection

Run analyses, write, and defend
Dissertation ☺
Submit EDT to SoE
Graduation **2023**

Manuscripts

Submit VO₂ & HR for publication
SR- review/ extract data
RESET Sleep – sleep health & SB
baseline

Finish writing SR/MA prep for
publication/send to co-authors
RESET finalize analyses

Publish Systematic review
RESET Sleep baseline
finish draft and send to co-
authors

RESET Sleep baseline –
finalize and have ready to
submit after sleep meeting

Abstracts/presentations

MARC-ACSM abstract (9/2/22)
CSCS research day abstract (9/25/22)
Annual ACSM (November 2022)
Sleep Meeting (December 2022)

MARC ACSM conference
November 4-5th (Harrisburg, PA)
CSCS research day (11/10/22)
Annual ACSM abstract submit
(October)
Sleep abstract **(December)**

Prepare posters
ACSM Annual Conference
May 30-June 3rd, 2023
(Denver, CO)
Sleep Meeting **June 3-7th**
(Indianapolis, IN)

Grants/Awards/post-doc applications

SRS small research grant (9/15/22)

Student travel grants
SOE student research grant
(November)
CGSE student research grant
(November)

ACSM award application
Sleep trainee award
application
Job applications

Job applications/ interviews
SOE travel grant application
CGSE travel grant application

Conceptual Model Goal Planning Rubric

Short-term goal: Examine the efficacy of a 4-week vinyasa yoga program on sleep-related and cardiovascular outcomes

Exercise is Medicine

Yoga

Training
1. RYT-200

Cheruka et. al. The effects of different intensities/styles of yoga on sleep: a systematic review. *(In progress)*

Butler JT, **Cheruka CA**, Kline CE. The acute therapeutic effects of Bhramari Pranayama on autonomic function and self-reported anxiety. *(Planned)*

Vogan OM, **Cheruka CA**, et. al. The association between sleep health and well-being in sedentary desk workers. *(In progress)*

Cheruka et. al. Oxygen Consumption and Heart Response to Standardized 60-Minute Vinyasa Yoga Practice. *(In review)*

Cheruka CA, et al. The relationship between sedentary behavior and sleep health in desk-based workers.

Long-Term Career Research Goal

The ultimate goal of my research career will be to provide promising and early treatment alternatives for insomnia that also support cardiovascular health.

Sleep

Cardiovascular

Sleep Outcomes
Insomnia symptoms
Sleep Quality
SOL, TST, WASO, SE
PSG – sleep stages

Training
1. PSG
2. Actigraphy
3. Analyzing PSG data

Training
1. Clinical Exercise Physiologist
a) CPET
b) Exercise prescription
2. Pulse Wave Velocity
3. Heart Rate Variability Data

Cardiovascular Outcome
Blood pressure
Heart Rate Variability
Heart Rate



Manuscript Rubric

- List all planned papers, then fit onto conceptual model
- If paper doesn't address a component of the model, does it demonstrate acquisition of a related skill?
- If paper doesn't fit onto model or demonstrate acquisition of a key skill, is it a priority?
- Can you rank order papers in terms of priority (per short term career goal)?

1. **Cheruka CA**, Takacs MP, Sgourakis A, Sherman SA, Kline CE. The effects of different yoga intensities/styles on sleep in adults with sleep disturbances: a systematic review. (*Under preparation*)
2. **Cheruka CA**, Sherman SA, Davis KK, Kline CE. Oxygen consumption and heart rate responses between different sequences of a vinyasa yoga practice. (*In review*)
3. **Cheruka CA**, Egeler ME, Kubala AG, Vogan OM, Sanders RM, Patel SR, Hall MH, Perera S, Jakicic JM, Gibbs BB, Kline CE. The relationship between sedentary behavior and sleep health in desk-based workers.
4. Vogan OM, **Cheruka CA**, Egeler ME, Kubala AG, Sanders RM, Paley JL, Patel SR, Hall MH, Perera S, Jakicic JM, Gibbs BB, Kline CE. The association between sleep health and well-being in sedentary desk workers. (*Under preparation*)
5. Butler JT, **Cheruka CA**, Kline CE. The acute therapeutic effects of Bhramari Pranayama on autonomic function and self-reported anxiety. (*Planned*)

Brainstorm/ Ideas

1. **Cheruka, CA**, et al. Examine relationships between nocturnal (catecholamines, cortisol) and cardiorespiratory fitness in good and poor sleepers. (*KINETICS data*)
2. **Cheruka, CA**, et al. Examine relationships between arterial stiffness and sleep across physical activity levels (*Swan data*)

Rachel M. Sanders, MA, ACSM-EP
PhD. Student in Exercise Physiology
Mentor: Dr. Christopher Kline



Goal Rubric

Year 01 PhD

Year 02 PhD

Year 03 PhD

Year 04 PhD

Goal: Transition into
Government Research or Post-
Doctoral Research

Year 2 Goal: Pre-dissertation project proposal and defense at the end of year 2.

Year 2 Needed to achieve goal:

- Develop a manuscript for publication (either from conference abstract or new project)

Skills

- Gaining proficiency in the physiology/mechanisms behind 24-hour behaviors, Rest Activity Rhythms, and cardiovascular health (specifically arterial stiffness)
- Learning R statistical programming
- Currently work on two research studies scoring actigraphy and applying polysomnography
- Writing abstracts and manuscripts for presenting/publishing

Potential Upcoming Conference Presentations

- Sleep Research Day November 2022
- American College of Sports Medicine Conference May/June 2023
- SLEEP Meeting June 2023

Rachel M. Sanders, MA, ACSM-EP
 PhD. Student in Exercise Physiology
 Mentor: Dr. Christopher Kline

Goal Rubric

Year	Quarter 1: July-September	Quarter 2: October-December	Quarter 3: January-March	Quarter 4: April-June
<p>Doctoral Student Year 2</p>	<ul style="list-style-type: none"> • Learning about Rest Activity Rhythms • Working on secondary analysis for upcoming abstracts and manuscript focusing on Rest Activity Rhythms and Pulse Wave Velocity 	<ul style="list-style-type: none"> • Beginning the literature process for systematic review on 24/7 health behaviors • Gaining Proficiency in R programming • Sleep Research Day Presentation • Abstract submission to American College of Sports Medicine Conference (2023) • Abstract Submission to SLEEP Meeting (2023) 	<ul style="list-style-type: none"> - Finish literature search - Begin writing systematic review - Join an ACSM Committee (Professional Development) 	<ul style="list-style-type: none"> • ACSM Abstract Presentation (May/June) • SLEEP Meeting Abstract Presentation (June)

Publication

Bennett WL, Coughlin JW, Henderson J, Martin S, Yazdy GM, Drabo EF, Showell NN, McKinney C, Martin L, Dalcin A, **Sanders R**, Wang NY. Healthy for Two/Healthy for You: Design and methods for a pragmatic randomized clinical trial to limit gestational weight gain and prevent obesity in the prenatal care setting. *Contemp Clin Trials*. 2021 Dec 8;113:106647. doi: 10.1016/j.cct.2021.106647.

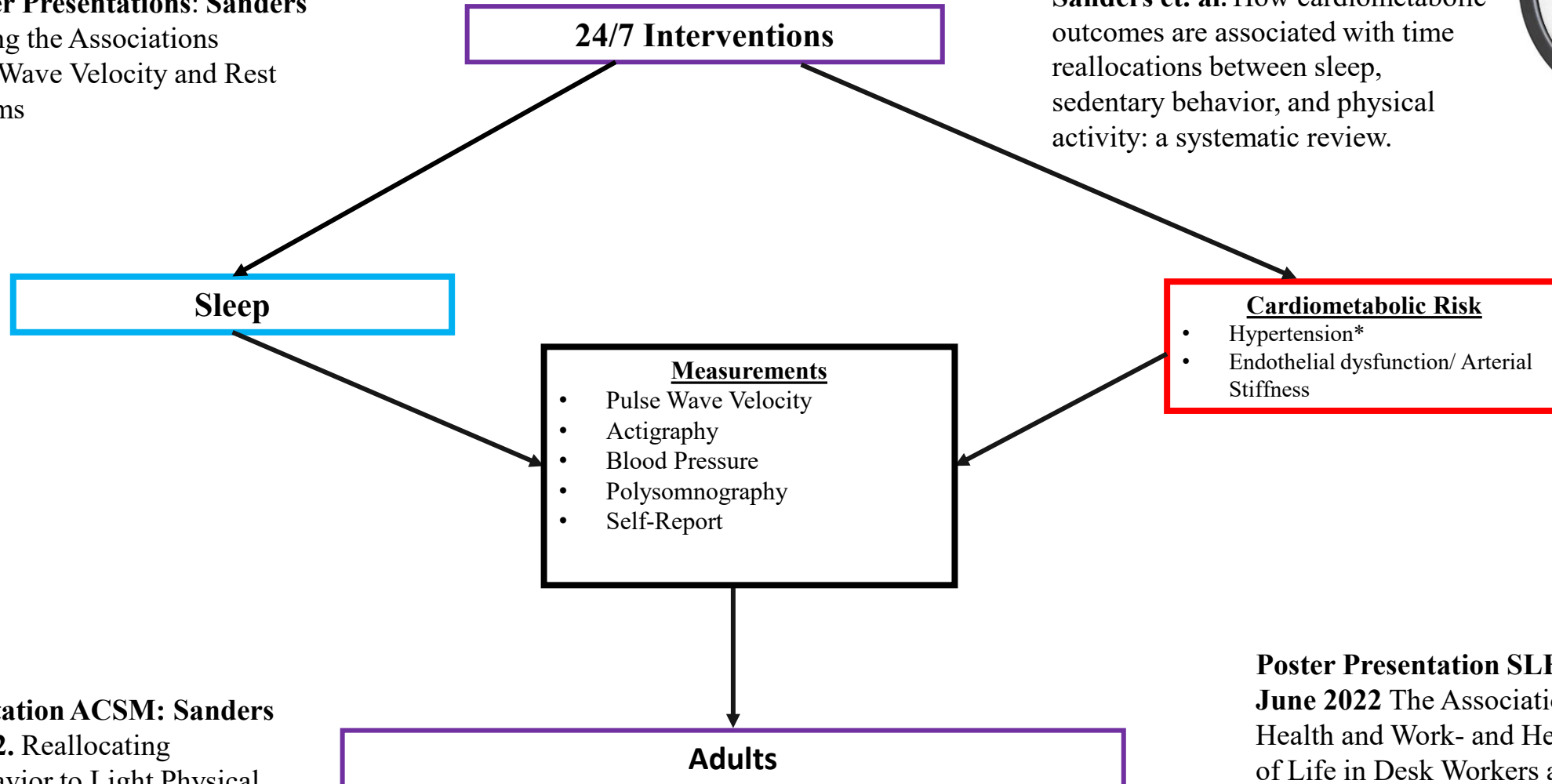
Manuscript in Review

Sanders RM, MacDonald HV, Higginbotham JC, Richardson MT, Lerma LN, Fedewa MV. Reallocating Sedentary Time to Physically Active Behaviors or Sleep: Associations of Body Mass Index in College Students. Submitted for Review: *Submitted November 2021*

Current Projects: Examine the impact of reallocating time spent in sedentary behavior to time spent in physically active behaviors and sleep in a 24-hour day. Furthermore, examine the relationships between Rest Activity Rhythms and pulse wave velocity (measurement of arterial stiffness).

Potential Poster Presentations: Sanders et. al. Examining the Associations Between Pulse Wave Velocity and Rest Activity Rhythms

Sanders et. al. How cardiometabolic outcomes are associated with time reallocations between sleep, sedentary behavior, and physical activity: a systematic review.



Poster Presentation ACSM: Sanders et.al June 2022. Reallocating Sedentary Behavior to Light Physical Activity in Adults and the Effect on Obstructive Sleep Apnea

Poster Presentation SLEEP: Sanders et. al. June 2022 The Association Between Sleep Health and Work- and Health-Related Quality of Life in Desk Workers and Differences in Associations Pre- and Post-COVID-19 Emergence