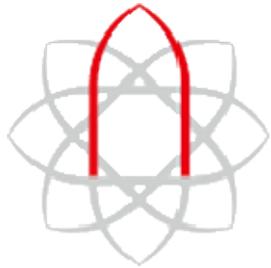


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# Sabbath and Health



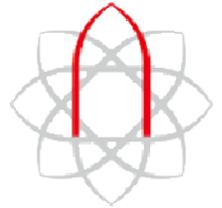
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Jerry W. Lee, PhD  
Department of Health Promotion & Education  
Loma Linda University School of Public Health

Presented at the Mind and Spirit In Dialog meeting at Loma  
Linda University, January 24, 2009

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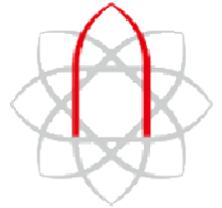
# Almost no empirical literature



- Marital intimacy greater among couples who observe Sabbath for intrinsic reasons
    - (Boyd, 1999, doctoral dissertation, Fuller Theological Seminary, School of Psychology)
  - In Israel death declines on Sabbath, increases on Sunday
    - (Anson & Anson, 2000, *Population Research and Policy Review*)
    - (Anson & Anson, 2001, *Social Science & Medicine*)
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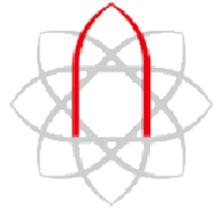
# Purpose



- Develop a measure of Sabbath beliefs and activities
  - Determine the structure of these beliefs and activities
  - Compare the structure in Adventists and Christians who attend church on Sunday
  - Learn how Sabbath beliefs and activities relate to health
-

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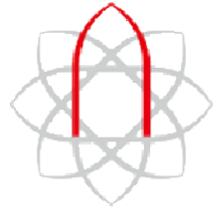
# Methods



- Developed a list of 51 Sabbath beliefs and activities
  - Internet survey of employees of Loma Linda University and Medical Center
  - 1,123 responded — 928 with less than 10% missing data
  - *Examined two subgroups*
    - *Adventists (599 individuals)*
    - *Christians who worship on Sunday (286 individuals)*
-

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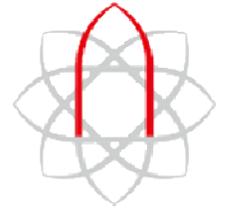
# Analysis 1



- Exploratory factor analysis
    - in two-thirds of Adventists
    - to learn the structure of Sabbath beliefs and activities
-

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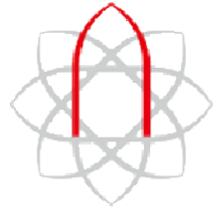
# Analysis 2



- Confirmatory factor analysis in full sample to
    - Confirm the structure
    - Compare Adventists and Christians who worship on Sunday
      - Do they group beliefs and activity items into the same sets?
      - If so, do the sets of beliefs and activities relate to each other in different ways in the two groups?
      - Do the two groups differ in
        - agreement with the beliefs and
        - how often they do the activities?
-

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# Analysis 3



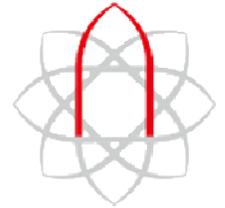
- Multiple regression
- How do the sets of Sabbath beliefs and activities relate to health?



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# The Structure of Sabbath Beliefs

(sample items)



## ■ Sabbath gives rest

- I feel a calm on Sabbath I experience less frequently on other days.
- Sabbath helps relieve my stress.

## ■ Keep Sabbath from social pressure

- I keep Sabbath to avoid criticism from other people.
- The primary reason I keep Sabbath is to fit in with others in my church.

## ■ Sabbath helps bonding with others

- Sabbath helps me bond with others.
- Sabbath makes me feel part of a wider community.

## ■ Keep Sabbath from duty or shame avoidance

- Sabbath keeping is my duty.
- When I don't keep Sabbath I feel guilty.

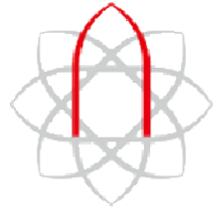
## ■ Elective helping on Sabbath is OK

- Painting the house of a needy elderly couple would be a good Sabbath activity
  - Volunteering to help at a food bank would be a good Sabbath activity
-

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# The Structure of Sabbath Activities

(sample items)



## ■ **Secular Activities**

- ❑ Go shopping
- ❑ Go out to see a motion picture

## ■ **Sabbath visiting**

- ❑ Cook a meal for a shut-in.
- ❑ Have people over for evening worship.

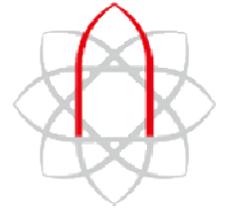
## ■ **Communal activities**

- ❑ Do food preparation
  - ❑ Go for a walk
-

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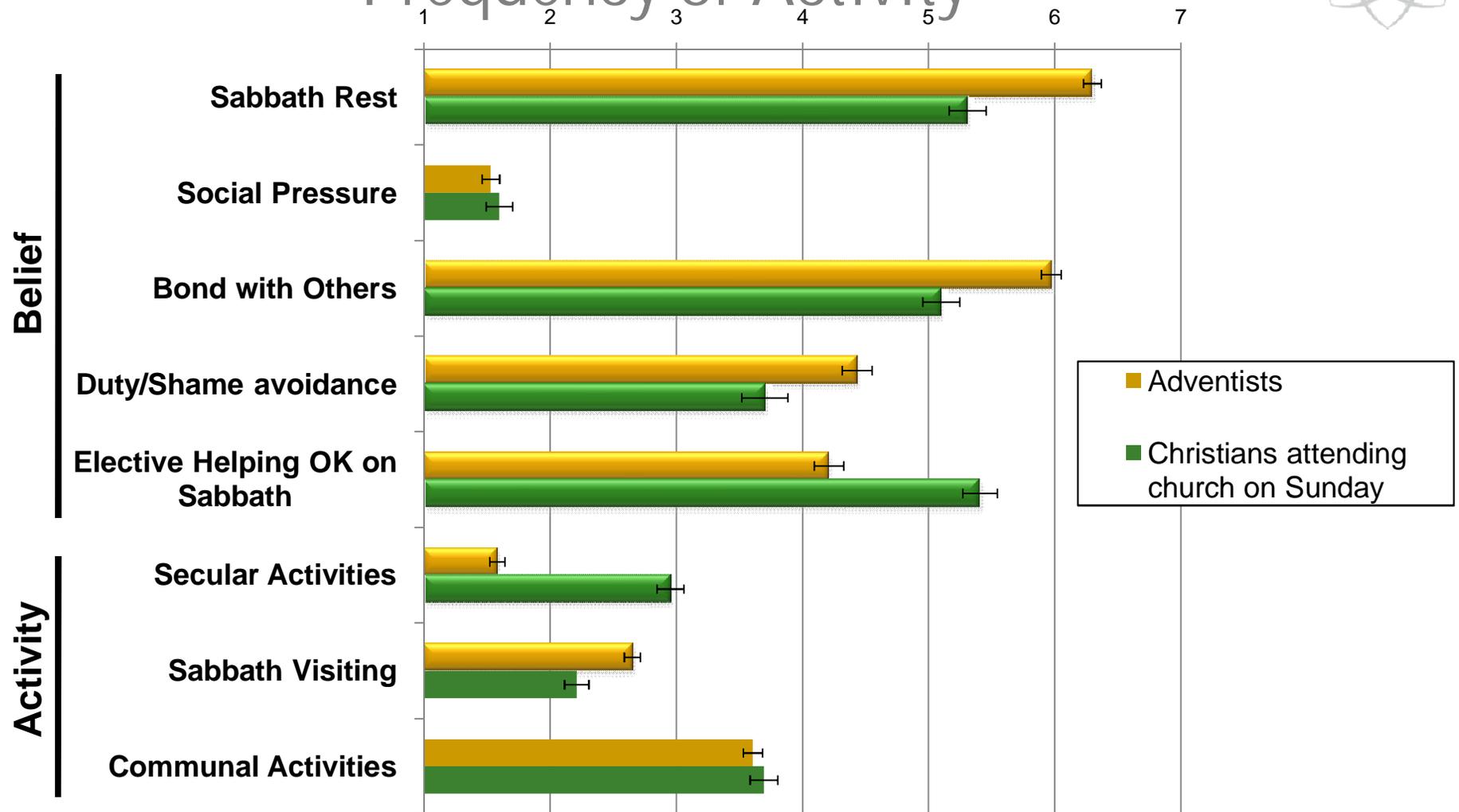
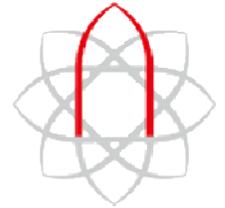
# Differences in Structure—

## Adventists and Sunday Church Attenders



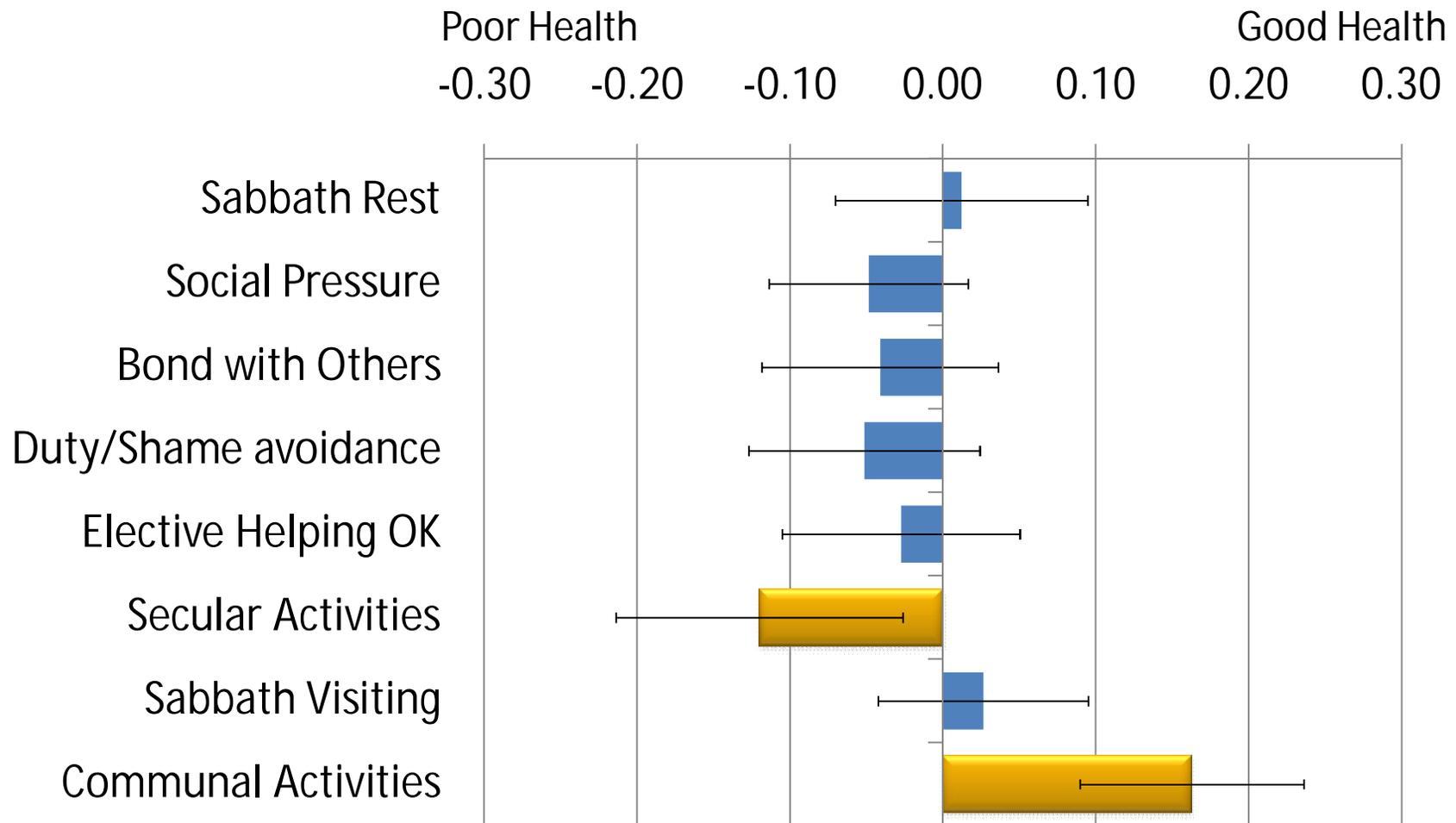
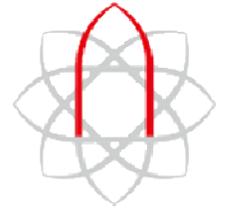
- 28 possible correlations among 8 factors
  - Only 3 showed large differences
    - When Sabbath rest was high, attending from duty or shame avoidance was also high
      - Stronger for Sunday attending Christians than for Adventists
    - When attending from social pressure high, engaging in secular activities on Sabbath also high
      - Stronger for Adventists than Sunday attending Christians
      - In fact association was absent for Sunday attending
    - Those who believed elective helping on Sabbath was OK also engaged in more communal activities
      - Stronger for Adventists than Sunday attending Christians
-

# Agreement with Belief / Frequency of Activity



# Relationship to Physical Health

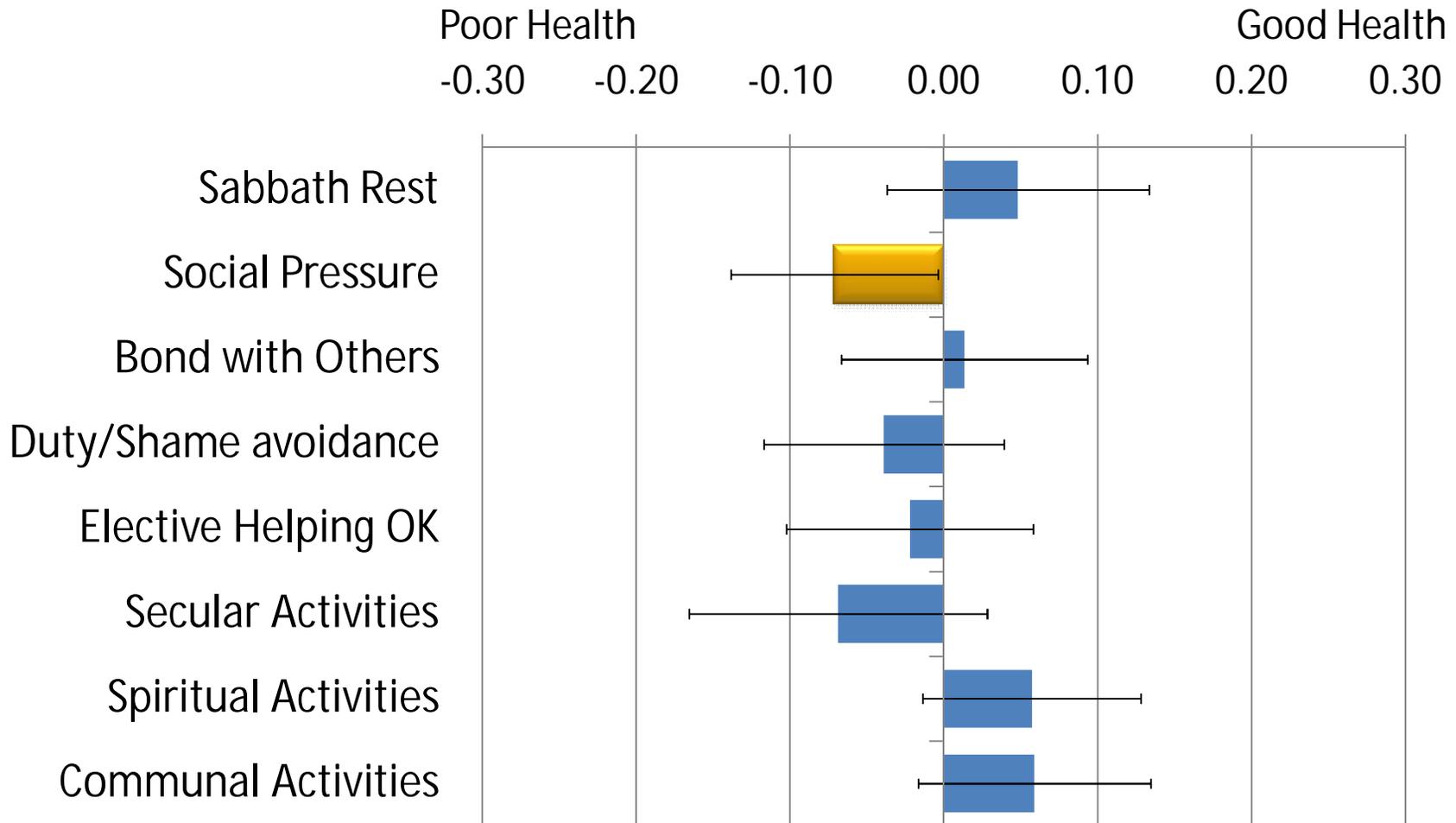
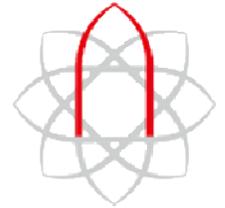
(Beta Coefficients)



Controlling for differences in gender, age, education, ethnicity, and religion.

# Relationship to Mental Health

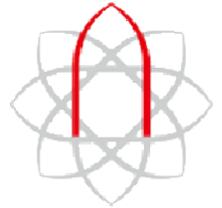
(Beta Coefficients)



Controlling for differences in gender, age, education, ethnicity, and religion.

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# Next questions



- Do some Sabbath beliefs and activities:
    - relate to quality of life in the main data set?
    - reduce the influence of stress on health?
    - increase the influence of stress on health?
    - predict later
      - hospitalization?
      - mortality?
-