

QUALITY-OF-LIFE AND COMORBID CONDITIONS AMONG ADULTS WITH CURRENT ASTHMA, TEXAS, 2011

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INTRODUCTION

- Adults with a chronic condition, like asthma, often have comorbidities
- Quality-of-life may be impacted by the presence of one or more chronic conditions
- Study objective: Examine the association between quality-of-life, comorbidities, and asthma status among adults in Texas

OBJECTIVES

- Determine the associations between current asthma and quality-of-life among adults in Texas
- Describe the associations between asthma and other chronic conditions
- Explore quality-of-life measures among persons with asthma and additional chronic conditions

METHODS

Five comorbid chronic conditions

- Obesity
- Additional lung disease (COPD, emphysema, chronic bronchitis)
- Depression
- Diabetes
- High blood pressure

Three quality-of-life measures

- Physical health not good on 5 or more of last 30 days
- Mental health not good on 5 or more of last 30 days
- Poor physical or mental health kept participant from doing usual activities on 5 or more of last 30 days

METHODS

- For each comorbid condition, created a 4-category variable with asthma
 - ▣ Diabetes Example: 0 = no diabetes, no asthma, 1 = Diabetes but no asthma, 2 = Asthma but no diabetes, 3 = Diabetes and asthma

- Logistic regression models

Predictors	Outcomes
Current asthma	<ul style="list-style-type: none"> • Comorbid conditions • Quality-of-life measures
4-category comorbidity variables	<ul style="list-style-type: none"> • Quality-of-life measures

- Models adjusted for sex, age, race/ethnicity, education, employment status, marital status, smoking status (current/non-current), health insurance coverage

RESULTS

	Current Asthma (%) [N=1,256]	No Current Asthma (%) [N = 13,607]	P-value
Total	7.4	92.6	<.0001
Female	65.9	49.4	<.0001
Age (years)	46.5 ± 1.6	44.4 ± 0.5	0.01
Race/Ethnicity			<.0001
White	62.1	49.1	
Black	15.5	10.9	
Hispanic	19.1	35.2	
Other	3.3	4.8	
Current smoker	24.6	18.6	0.04
Health care coverage	76.1	69.8	0.01
Employed	48.8	57.6	0.0005
Married	46.9	51.7	0.06

RESULTS

	Current Asthma (%) [N=1,256]	No Current Asthma (%) [N = 13,607]	P-value
Education			0.16
No high school diploma	16.3	20.3	
High school graduate ¹	28.4	26.6	
Some college or college graduate ²	55.4	53.1	
Household Income			0.20
< \$25,000	39.8	35.4	
\$25,000-\$75,000	36.0	37.5	
≥ \$75,000	24.2	27.1	

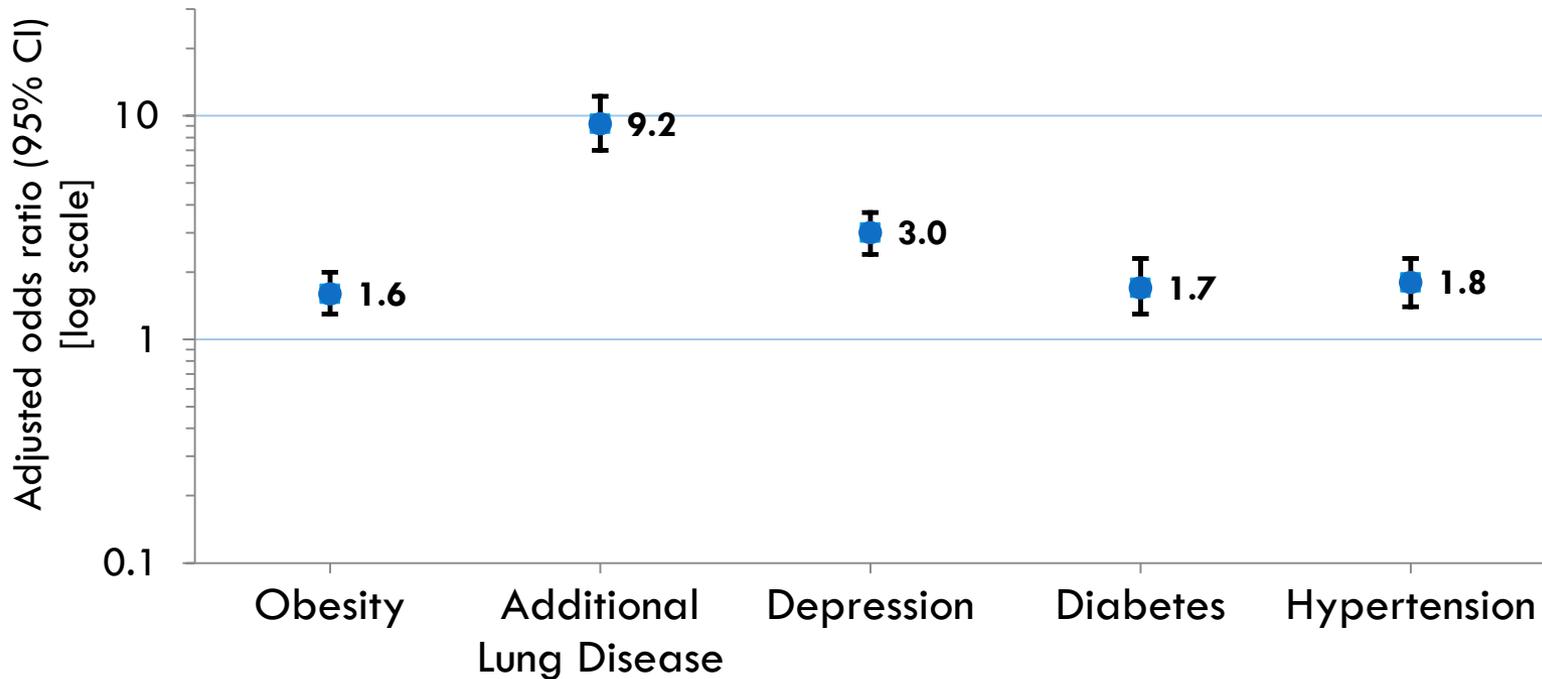
1 High school graduate includes GED. 2 Some college includes technical school.

RESULTS

	Current Asthma (%) [N=1,256]	No Current Asthma (%) [N = 13,607]	P-value
COMORBIDITIES			
Obesity (BMI ≥ 30)	38.9	29.8	0.0002
COPD, Emphysema, or Chronic Bronchitis	26.8	3.7	<.0001
Depression	38.7	14.6	<.0001
Diabetes	14.7	9.8	0.0002
Hypertension	45.1	30.2	<.0001
QUALITY-OF-LIFE			
Physical health not good	40.9	18.8	<.0001
Mental health not good	36.6	19.3	<.0001
Activities limited due to poor physical or mental health	29.7	11.9	<.0001

RESULTS

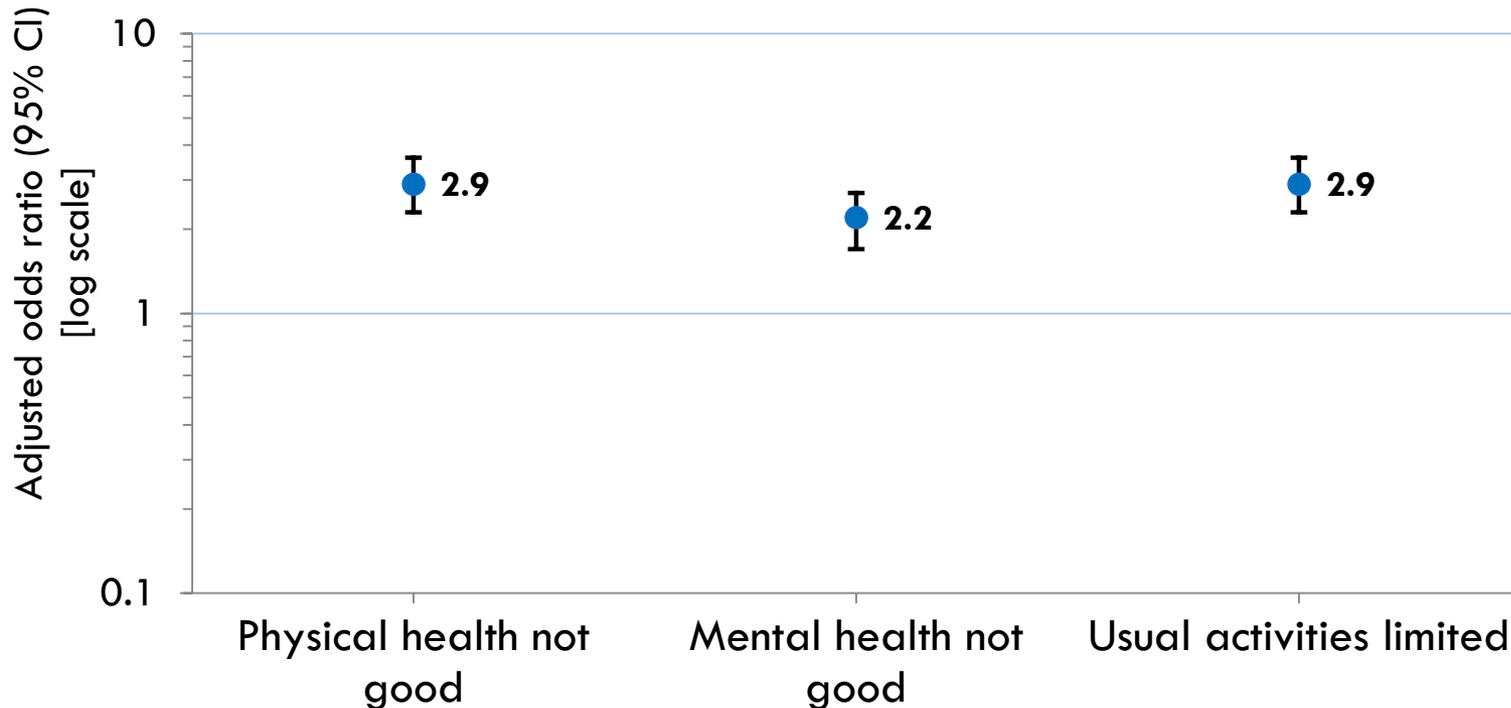
Adjusted* Odds Ratios for Comorbid Conditions Comparing Adults with Current Asthma vs. No Current Asthma



*Models adjusted for sex, age, race/ethnicity, education, employment status, marital status, smoking status, health insurance coverage.

RESULTS

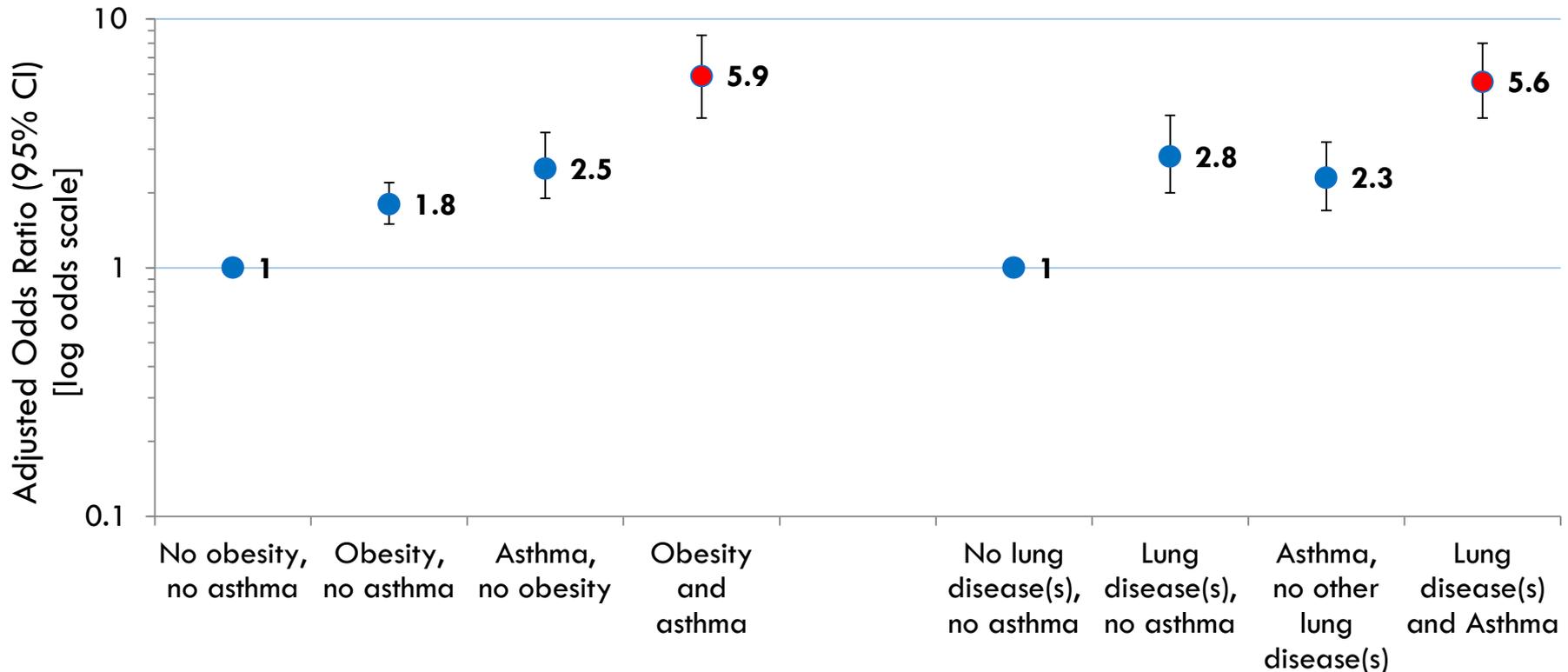
Adjusted* Odds Ratios for Quality-of-Life Comparing Adults with Current Asthma vs. No Current Asthma



*Models adjusted for sex, age, race/ethnicity, education, employment status, marital status, smoking status, health insurance coverage.

RESULTS

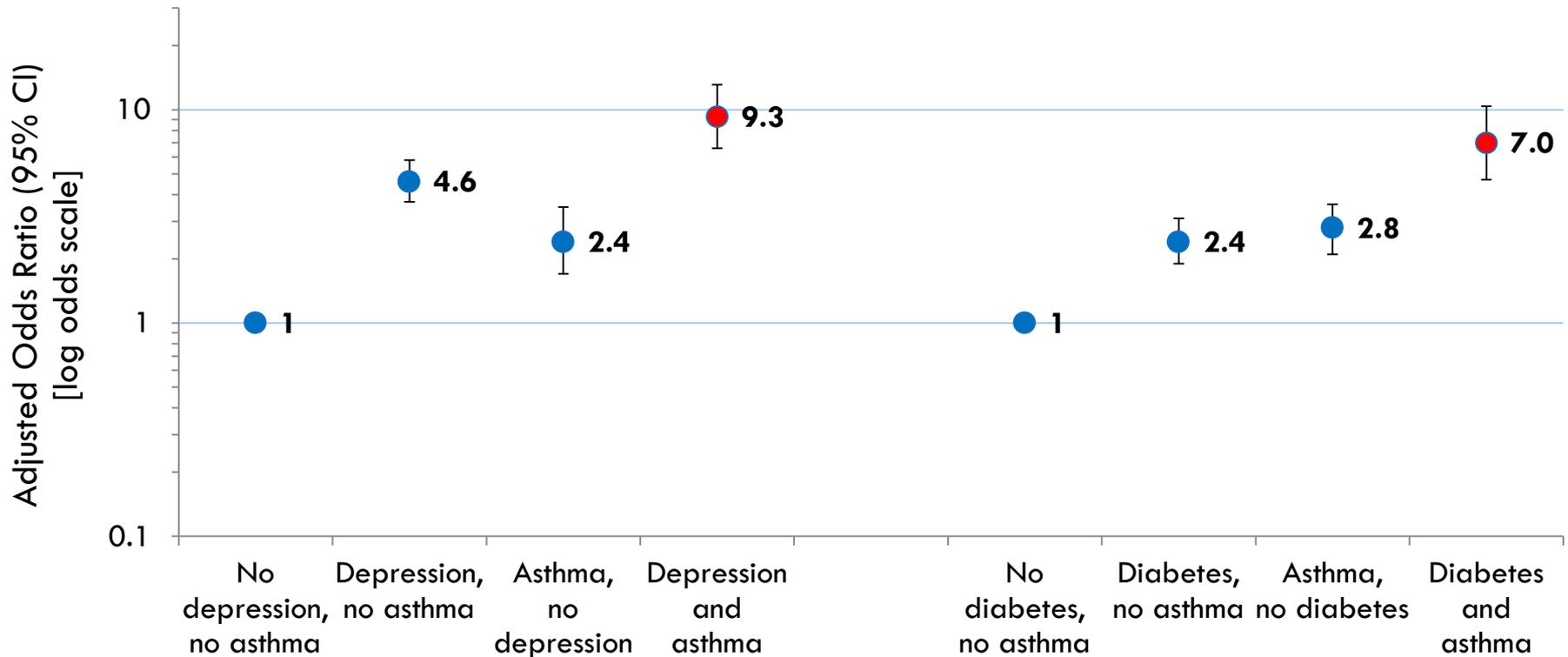
Adjusted* Odds Ratios for 'Activities Limited Due to Poor Physical or Mental Health' By Chronic Condition(s)



*Models adjusted for sex, age, race/ethnicity, education, employment status, marital status, smoking status, health insurance coverage.

RESULTS

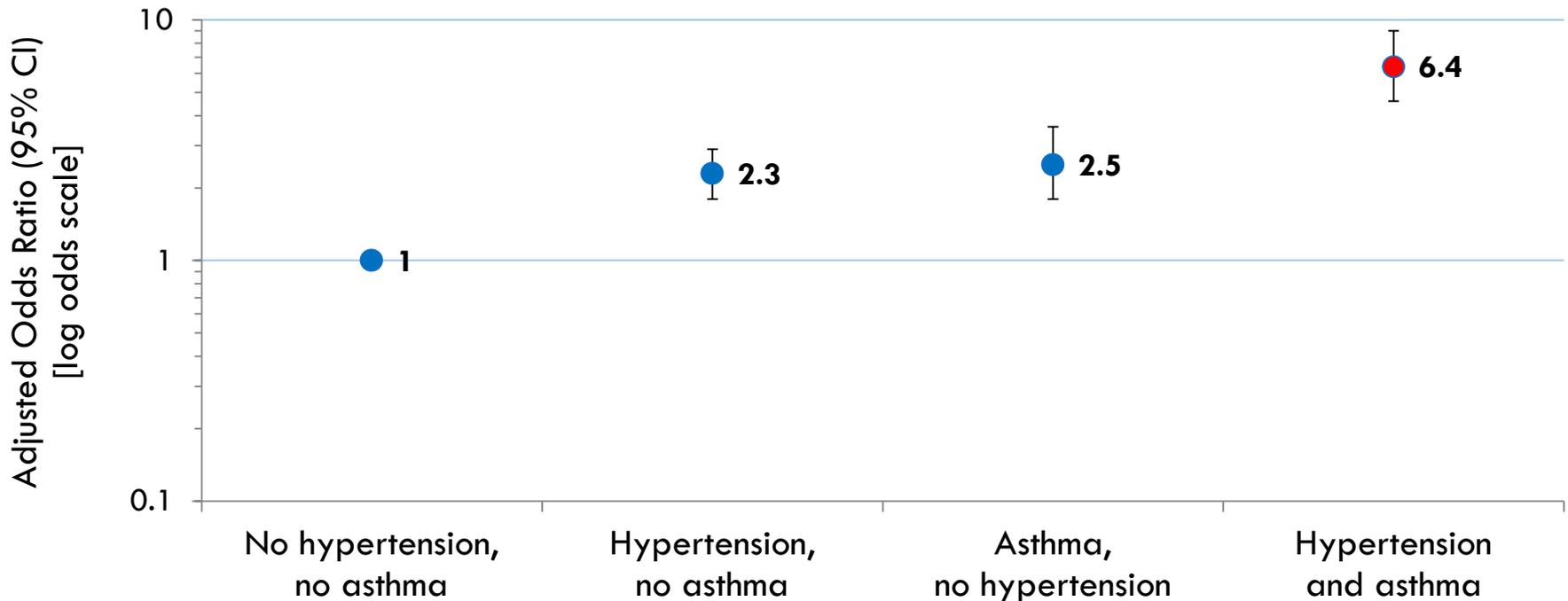
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LIMITATIONS

- Only self-reported, physician diagnosed chronic conditions – Undiagnosed conditions not captured

- Time factor
 - Current: Asthma and obesity
 - Ever: Diabetes, depression, chronic lung conditions, hypertension
 - Medication use and/or self-management of chronic conditions not considered

- Other quality-of-life measures and chronic conditions not included

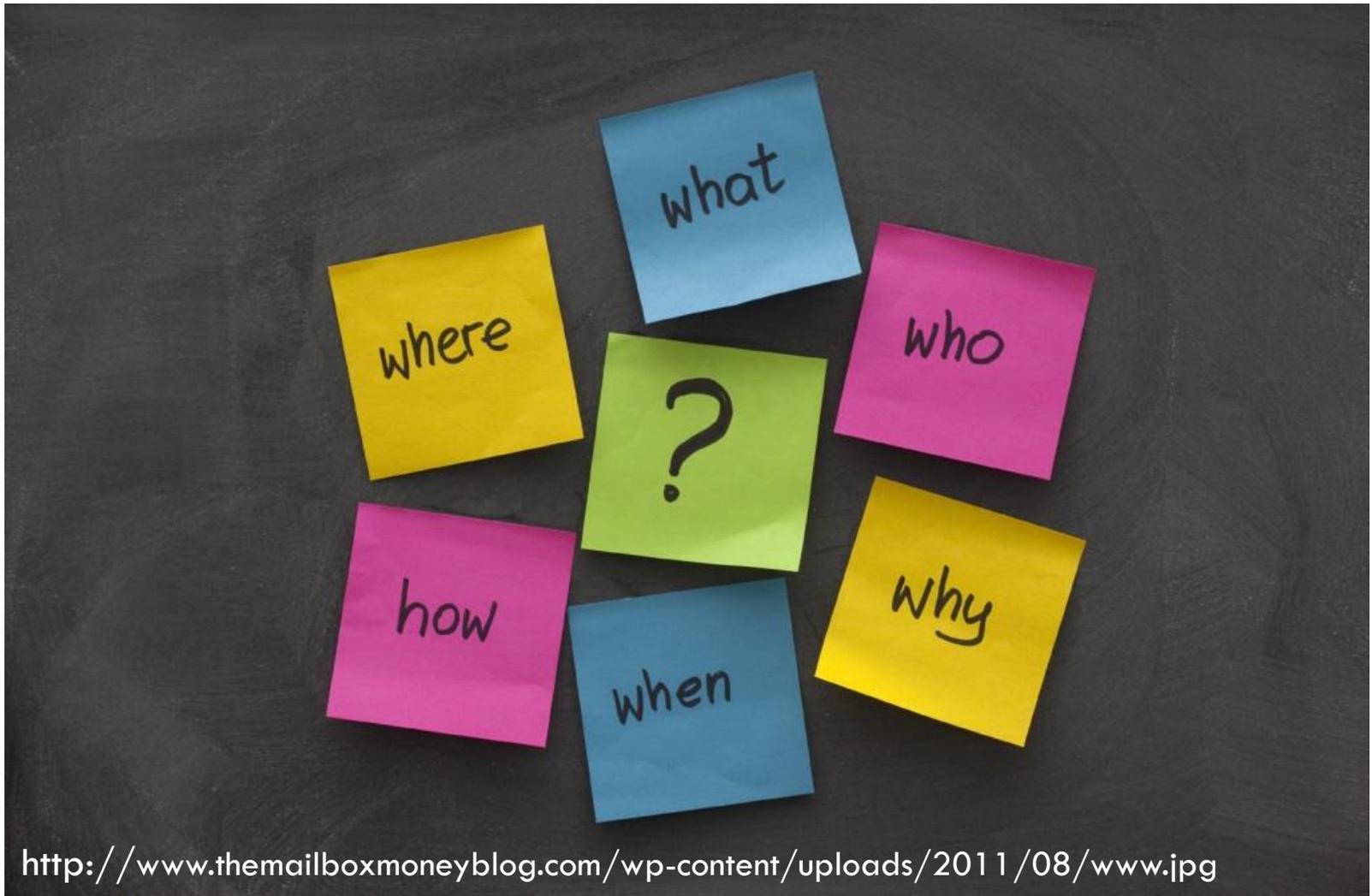
CONCLUSIONS

- It is common for adults with asthma to have other chronic health conditions such as obesity; COPD, emphysema, or chronic bronchitis; depression, diabetes, and hypertension
- Consider impact on quality-of-life of asthma with at least one other chronic condition when planning and implementing asthma interventions
- Opportunity to collaborate with other chronic disease programs for health promotion and disease management

Thank you!

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 - Nimisha Bhakta, MPH – Lead Epidemiologist, Health Promotion and Chronic Disease Prevention Section
 - Elaine Braslow, MEd – Program Coordinator, Texas Asthma Control Program

QUESTIONS



<http://www.themailboxmoneyblog.com/wp-content/uploads/2011/08/www.jpg>

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