Integrative Medicine

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April 4th, 2012

SCRIPPS CLINIC
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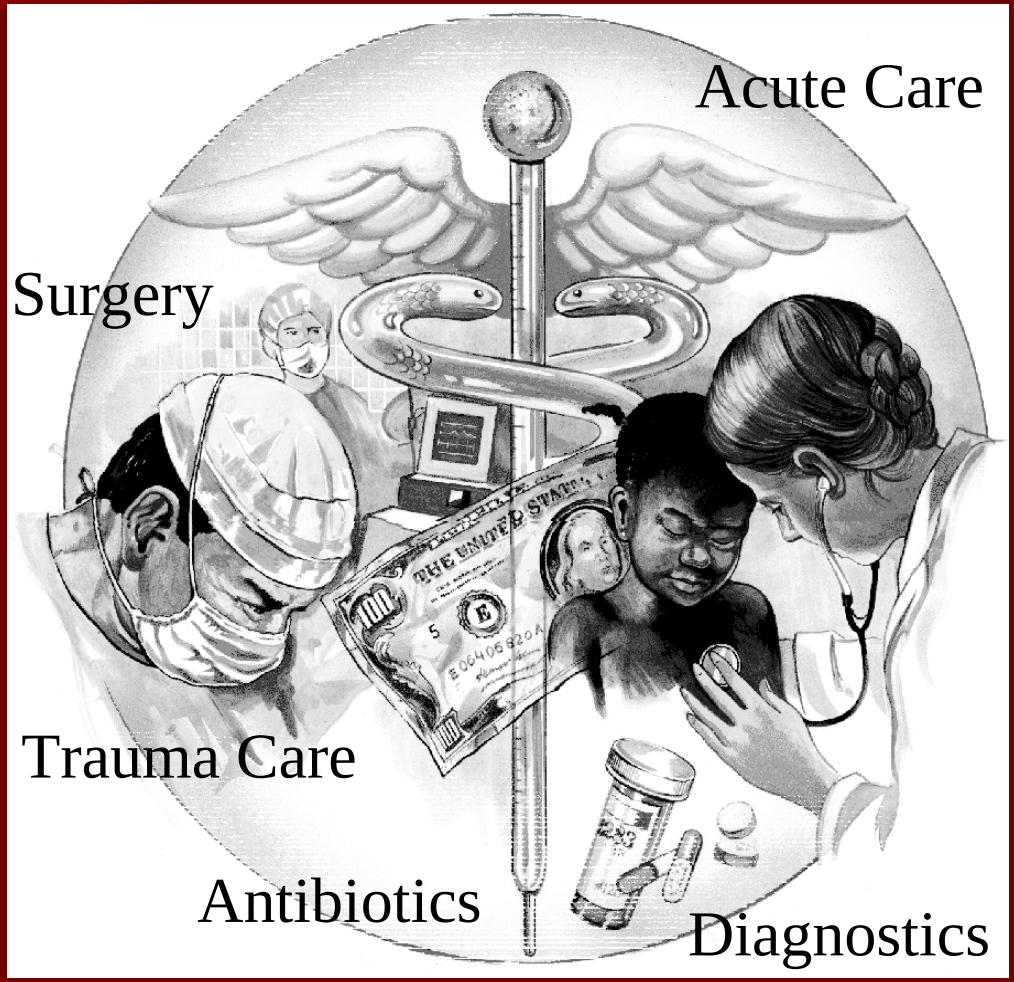
Breathing Exercise

IN	HOLD	OUT
4 sec	7 sec	8 sec

- Takes 19 seconds
- You can do it anywhere
- No side effects
- No interaction with drugs
- Free

Strength of Conventional Medicine



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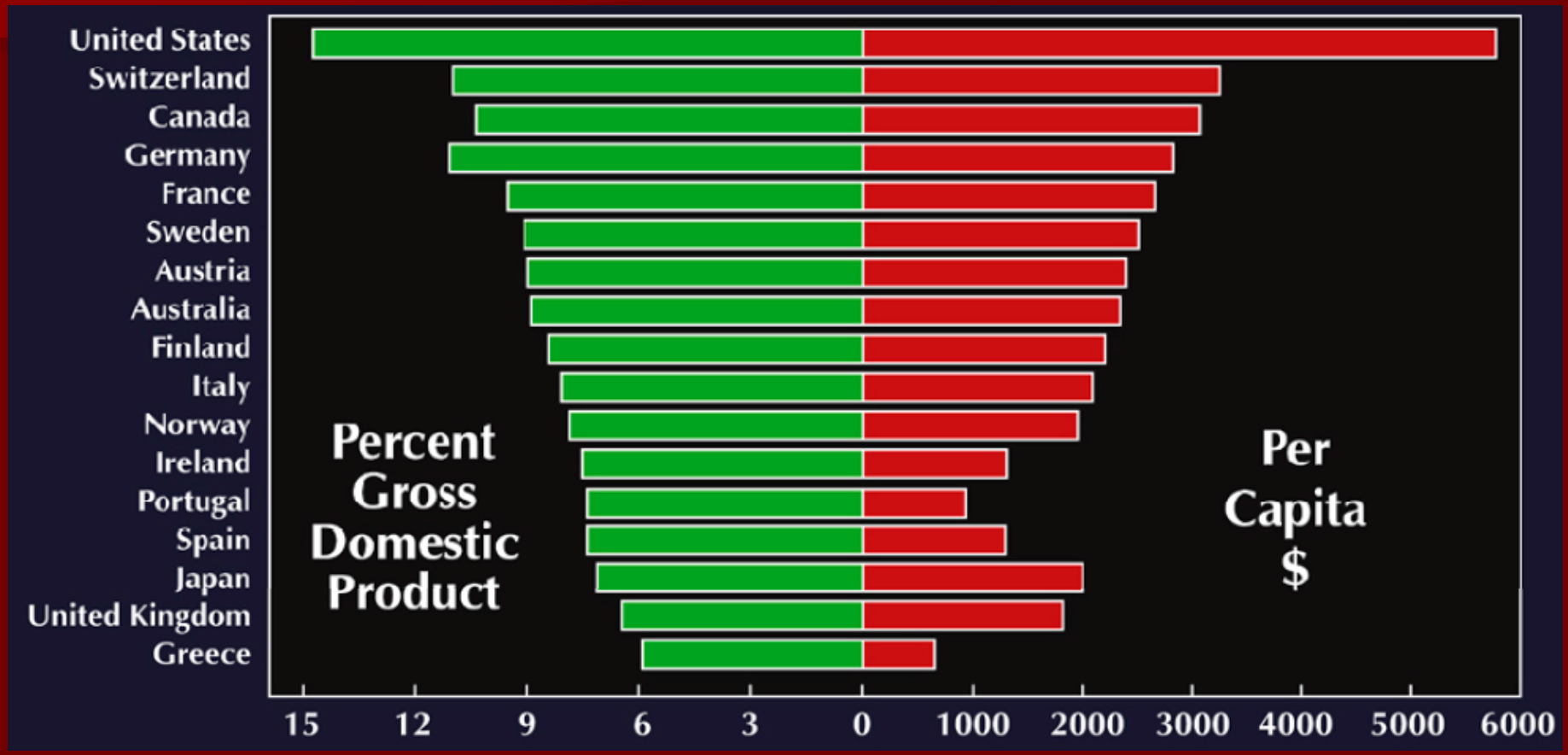
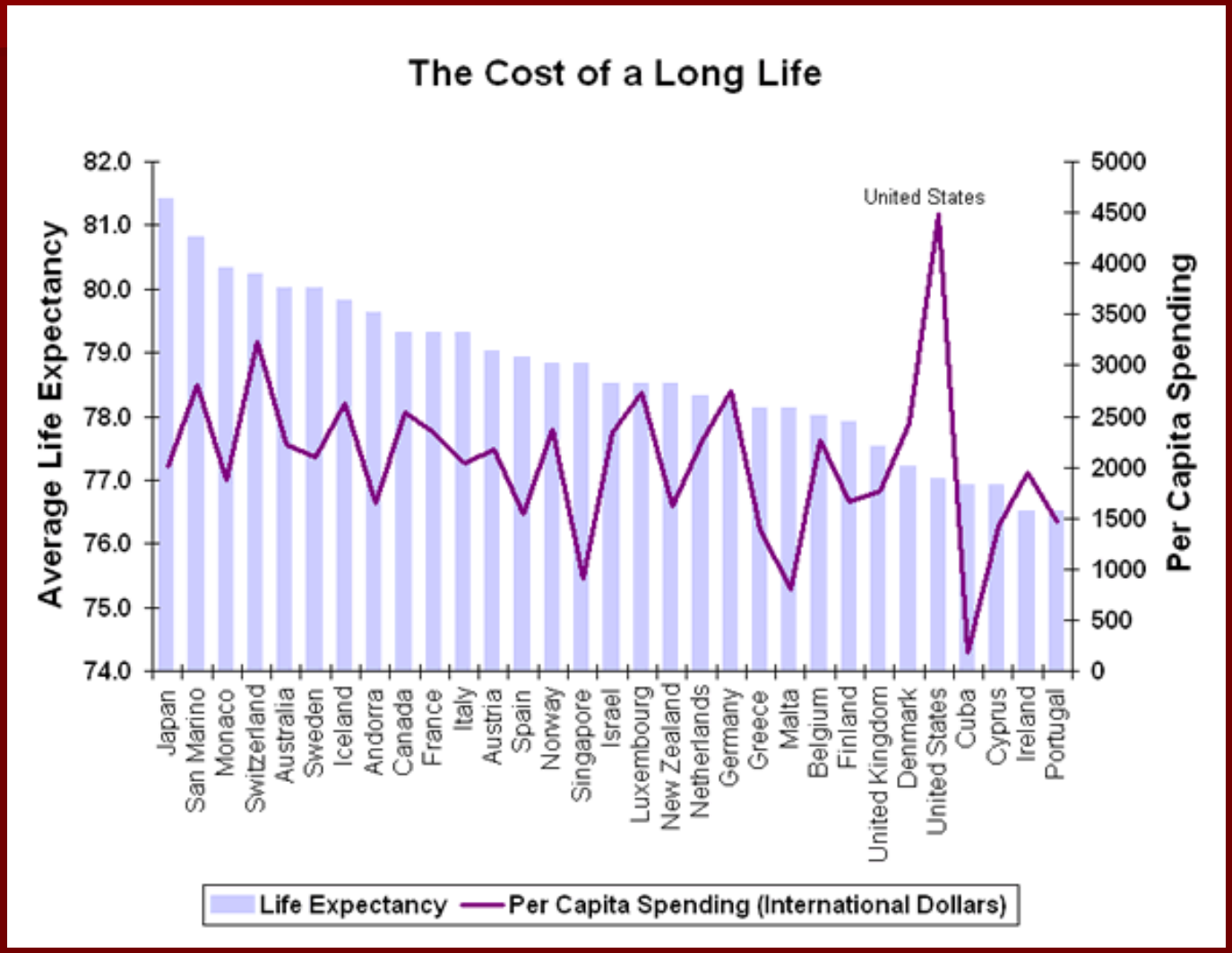
International Medical Expenditures



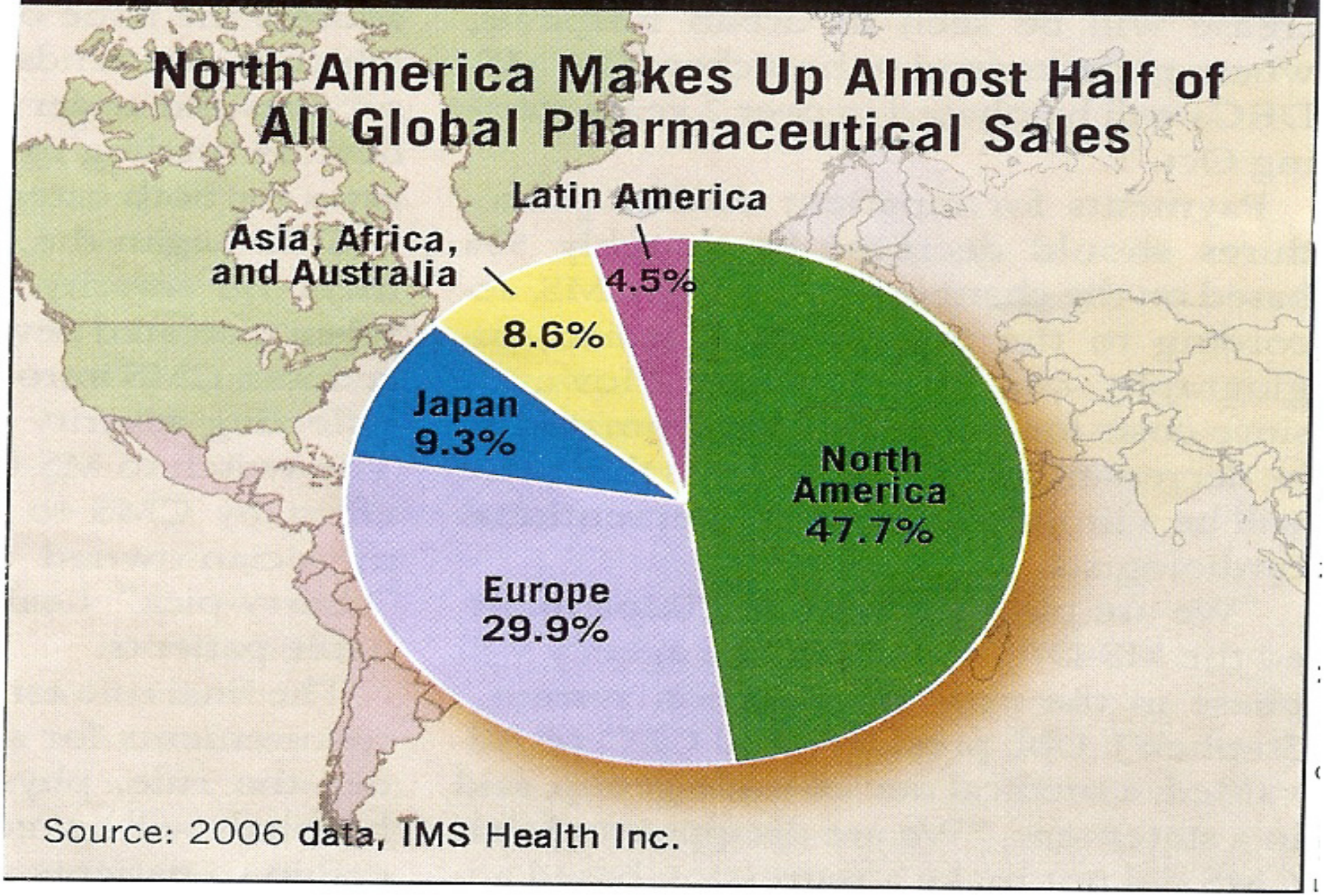
Reinhardt UE, JAMA 2004;292:1227-1230

International Life Expectancy



DATA WATCH

North America Makes Up Almost Half of All Global Pharmaceutical Sales



Source: 2006 data, IMS Health Inc.

AHA 2011

- CVD claimed 813,804 lives in 2007
- 1 of every 2.9 deaths in the US
- 2,200 Americans daily
- 1 death every 39 seconds
- Congestive Heart Failure 277,193 deaths
- New Heart Attacks 785,000/year
- New Strokes 795,000/year

Circulation. Feb 2011;123:e18-e209

Integrative Medicine Defined

2007 Survey of Complimentary and Alternative Medicine (CAM)

- In 2007, 38% of adults reported using CAM
- 83 million adults spent $33.9 billion on CAM
  - 11.2% of total out-of-pocket expenditure
- 354 million visits to Cam providers
  - $11.9 billion spent on provider visits
- 14.8 billion spent on nonvitamin, nonmineral, naturalproducts
  - Equivalent to approximately one-third of total out-of-pocket spending on prescription drugs

Why CAM?

- Patients dissatisfied with conventional treatments
- Means of autonomy and control over their healthcare decisions
- More compatible with values and beliefs.
- Belief that diseases are linked to environmental, emotional and mind-body factors
- Desire to take fewer medications and decrease side effects

Integrative Medicine Defined...

Integrative Medicine is the practice of medicine that reaffirms the importance of the relationship between practitioner and patient, focuses on the whole person, is informed by evidence, and makes use of all appropriate therapeutic approaches, healthcare professionals and disciplines to achieve optimal health and healing.

From the Consortium of Academic Health Centers for Integrative Medicine CAHCIM

Integrative Medicine Applied

- Patient-centered care
- Understanding the connection between lifestyles and health
  - Nutrition and exercise
- Prevention/Early detection
  - Identifying risk factors (including genetics) early and modifying one's lifestyle to prevent disease outcomes
  - Understanding Breast Exam, colonoscopies, prostate screening, etc. are early detection
- Drug and herbal therapies
- Mind-body Connection
  - Stress mastery
  - Group support
  - Spirituality

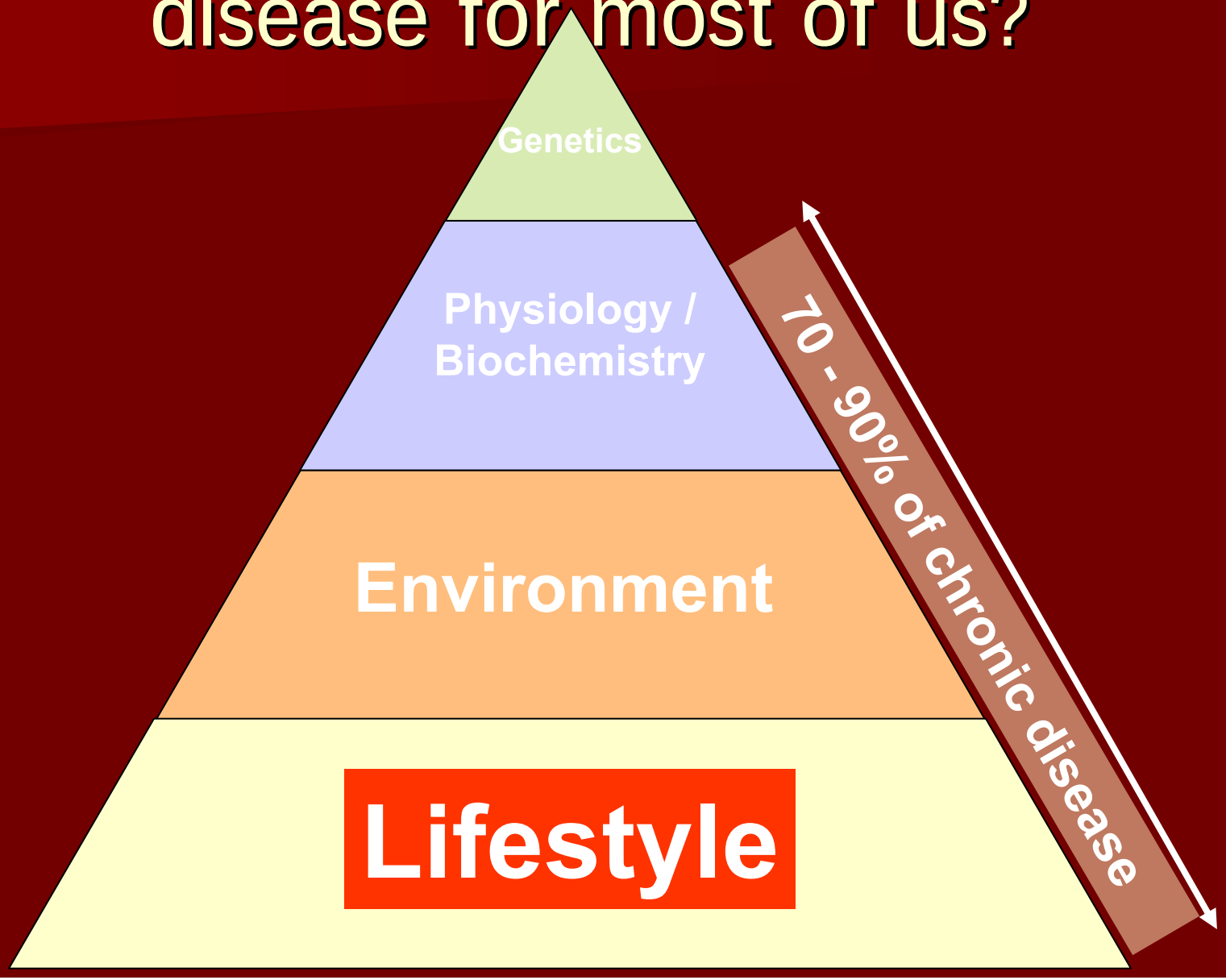
Integrative Medicine Applied

- Integrative Medicine Philosophy
  - Health is more than the absence of disease
  - Early detection stands a better chance of cure
  - Food is Medicine
  - Thought can become biology
  - Prevention is the best intervention
  - Healing is different from curing

Integrative Medicine Applied

- Integrative Medicine is not:
  - Complementary Alternative Medicine
  - Substituting an herb for a drug
  - Unscientific
  - New age medicine

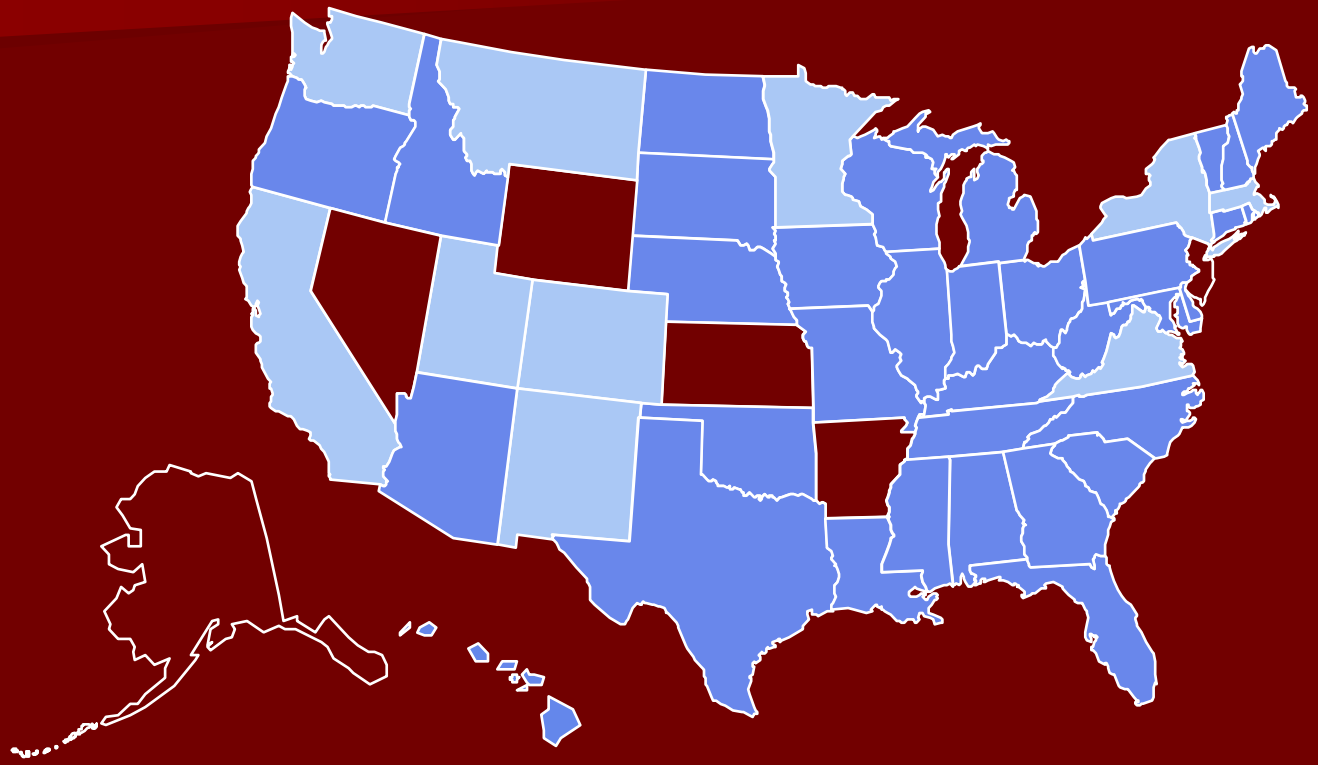
What really determines health and disease for most of us?



Obesity Trends* Among U.S. Adults

BRFSS, 1990

(*BMI ≥30, or ~ 30 lbs. overweight for 5' 4" person)



CDC

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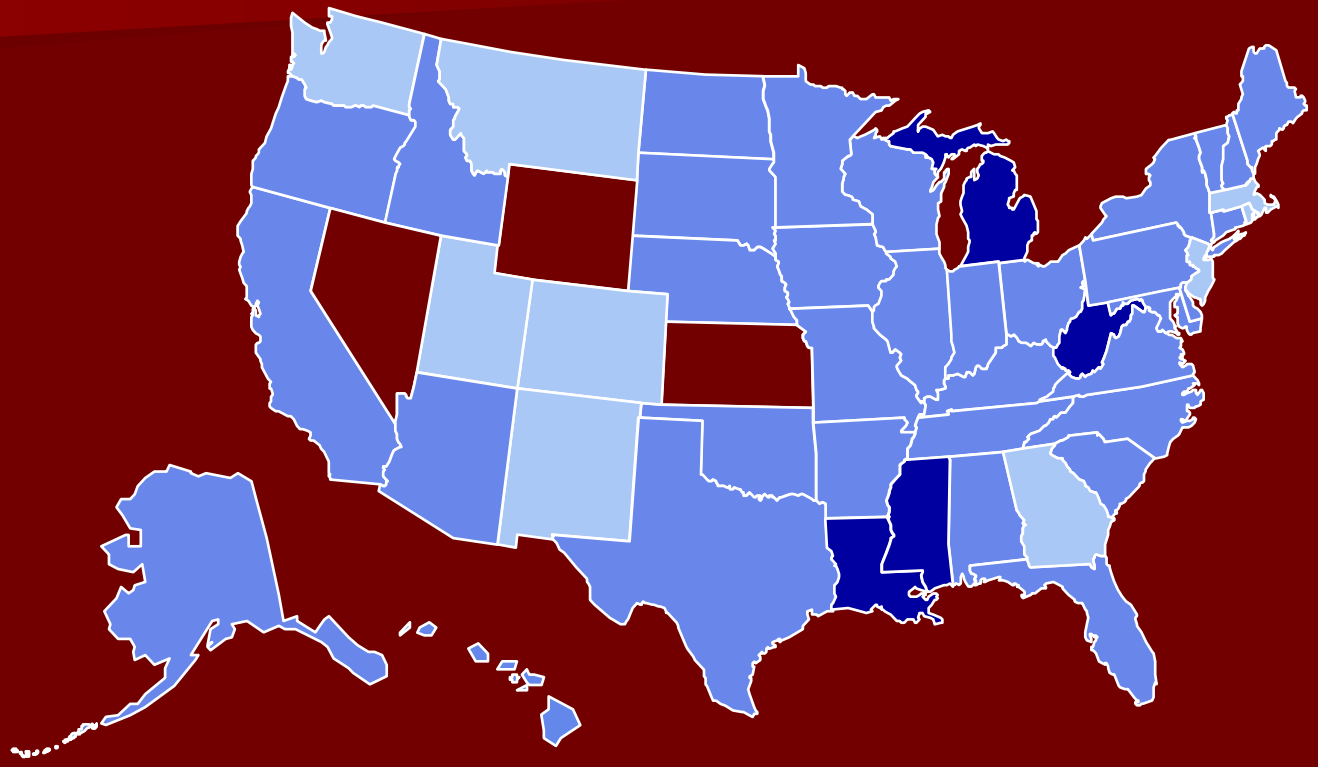

No Data | <10 % | 10%–14% | 15%–19%

CDC

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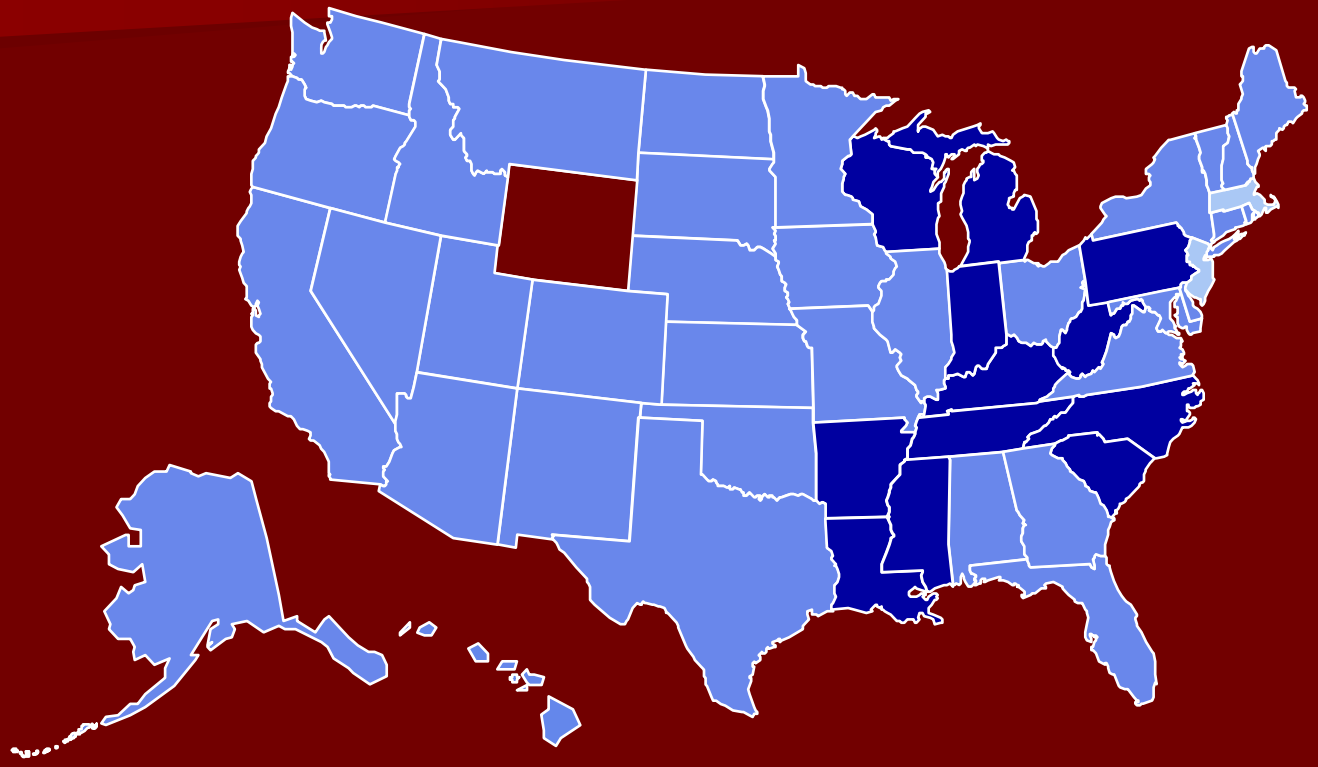

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CDC

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BRFSS, 1995

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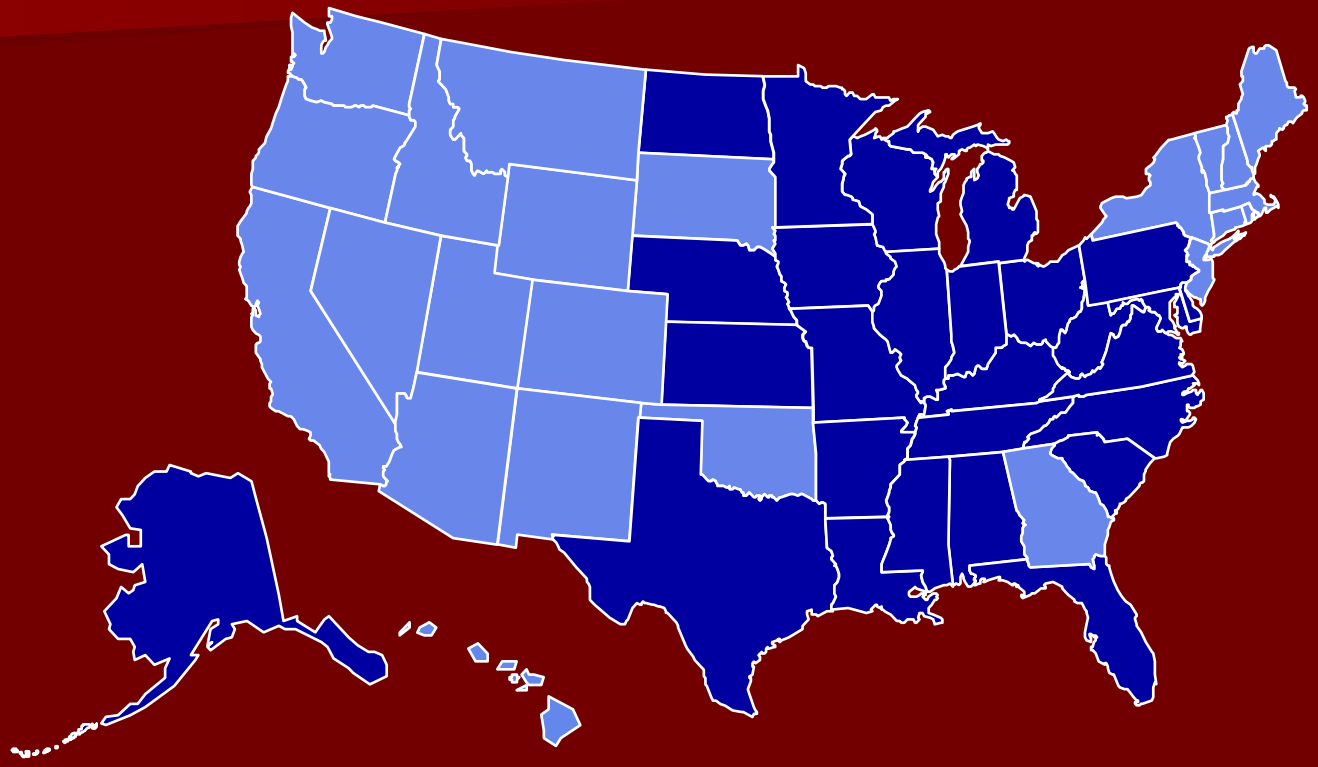

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CDC

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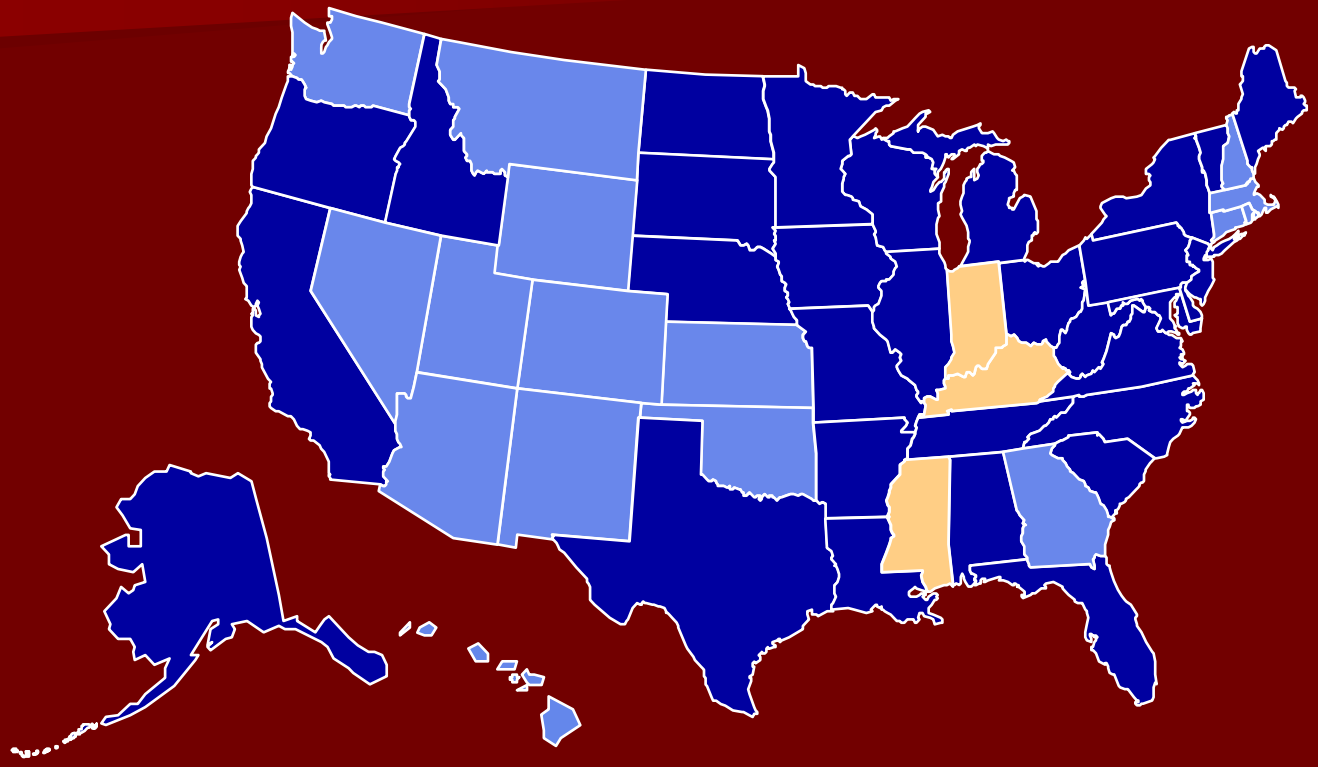
Obesity Trends* Among U.S. Adults

BRFSS, 1997

(*BMI ≥30, or ~ 30 lbs. overweight for 5' 4" person)



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CDC

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Obesity Trends* Among U.S. Adults

BRFSS, 1999

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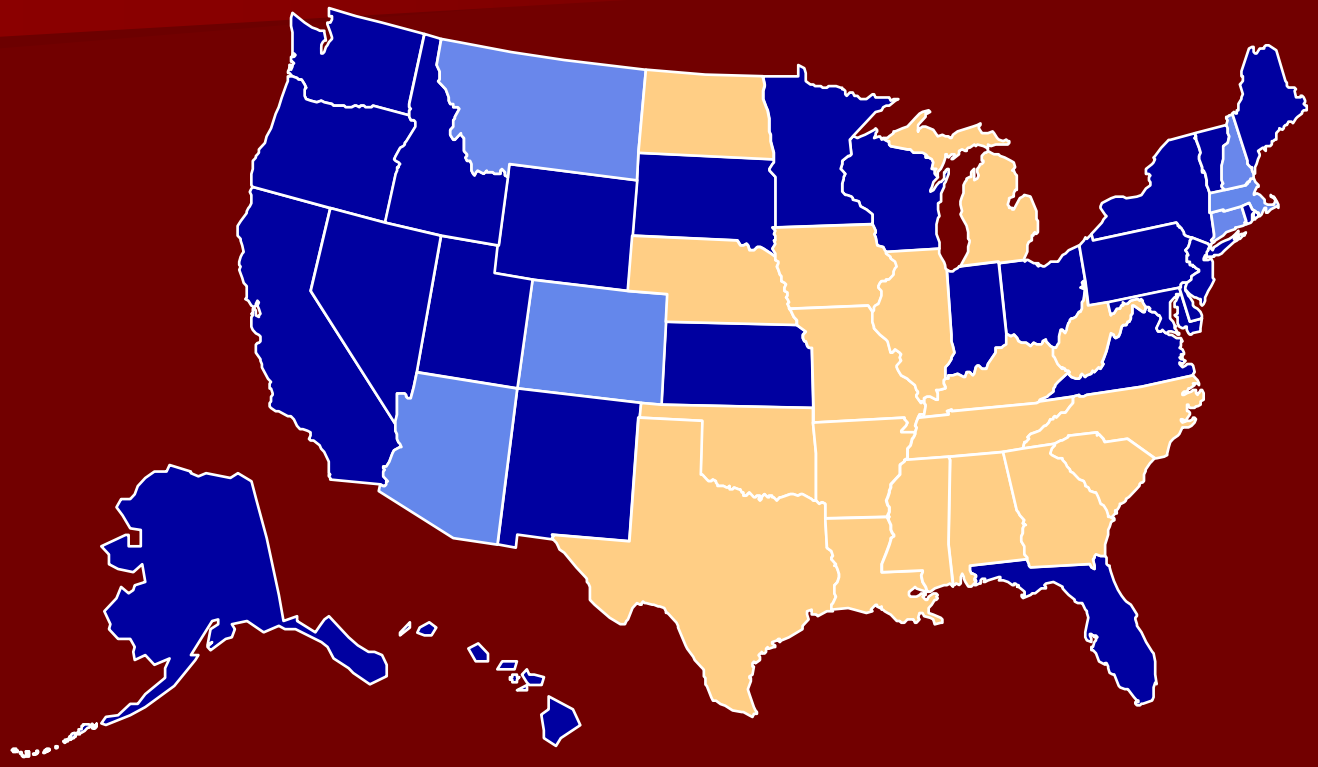

No Data | <10% | 10%–14% | 15%–19% | ≥20%

CDC

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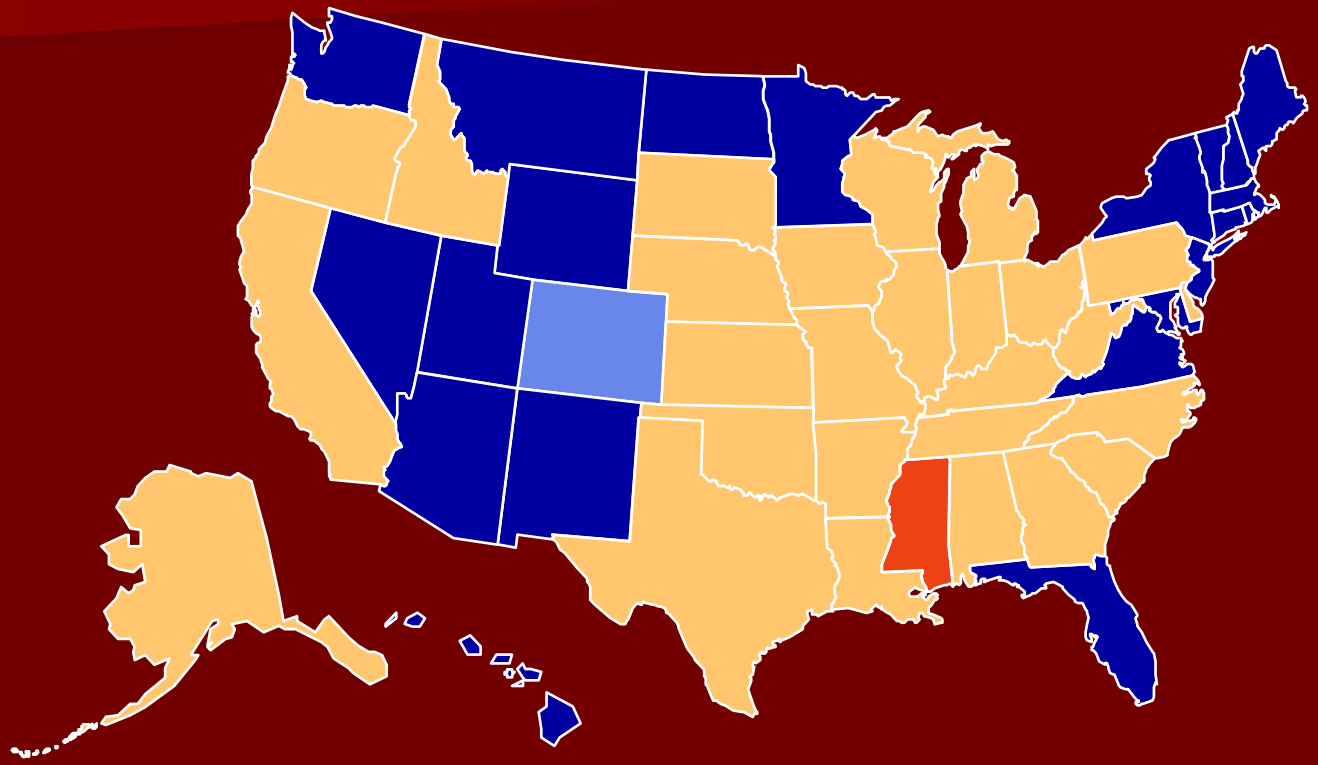
Obesity Trends* Among U.S. Adults

BRFSS, 2001

(*BMI ≥30, or ~ 30 lbs. overweight for 5' 4" person)



No Data | <10% | 10%–14% | 15%–19% | 20%–24% | ≥25%

CDC

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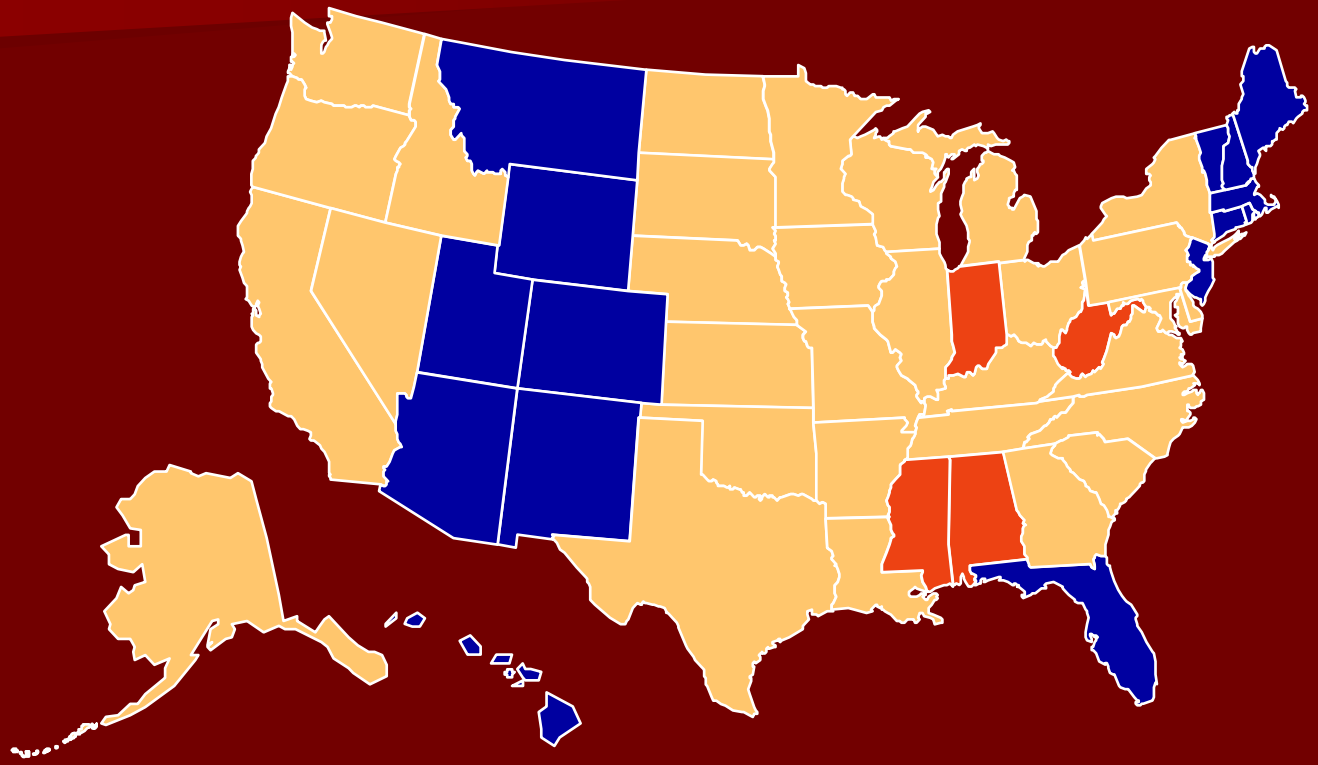
Integrative Medicine

Obesity Trends* Among U.S. Adults

BRFSS, 2003

(*BMI ≥30, or ~ 30 lbs. overweight for 5' 4" person)



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CDC

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BRFSS, 2005

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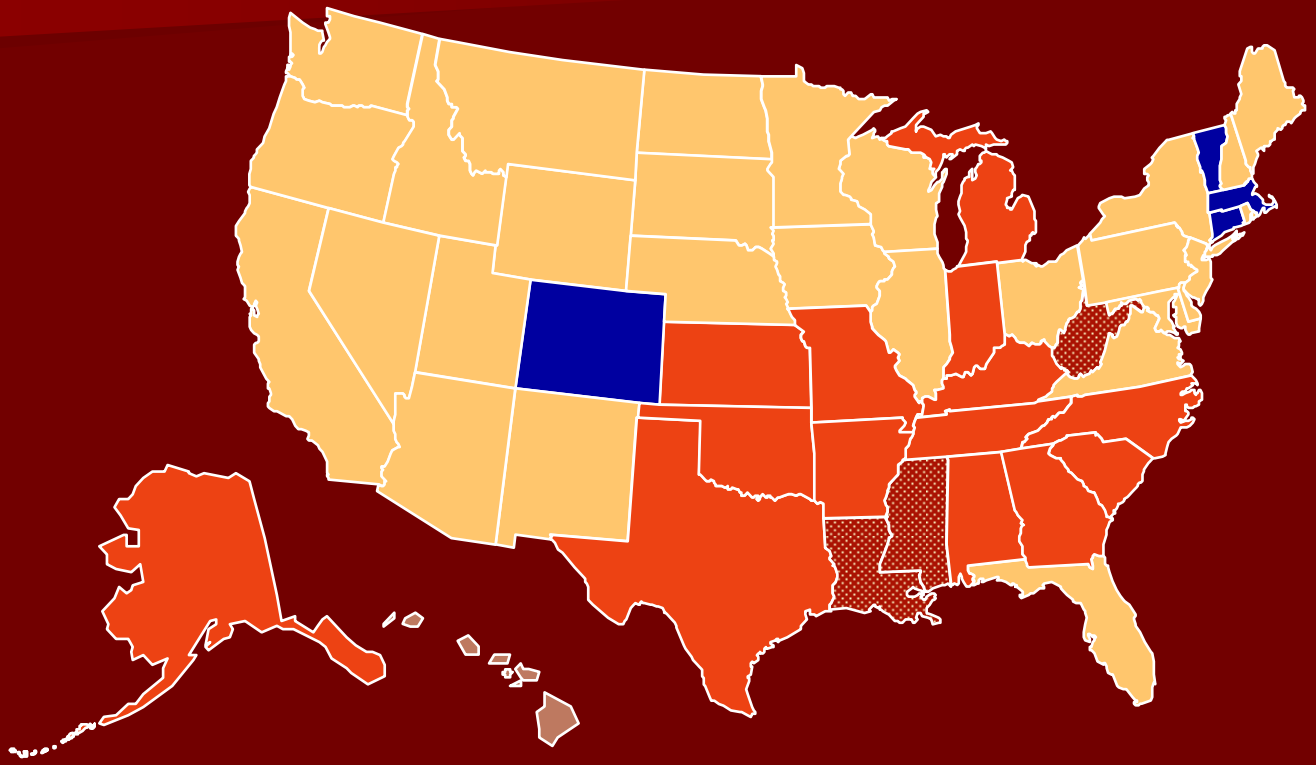

No Data | <10% | 10%–14% | 15%–19% | 20%–24% | 25%–29% | ≥30%

CDC

SCRIPPS CLINIC
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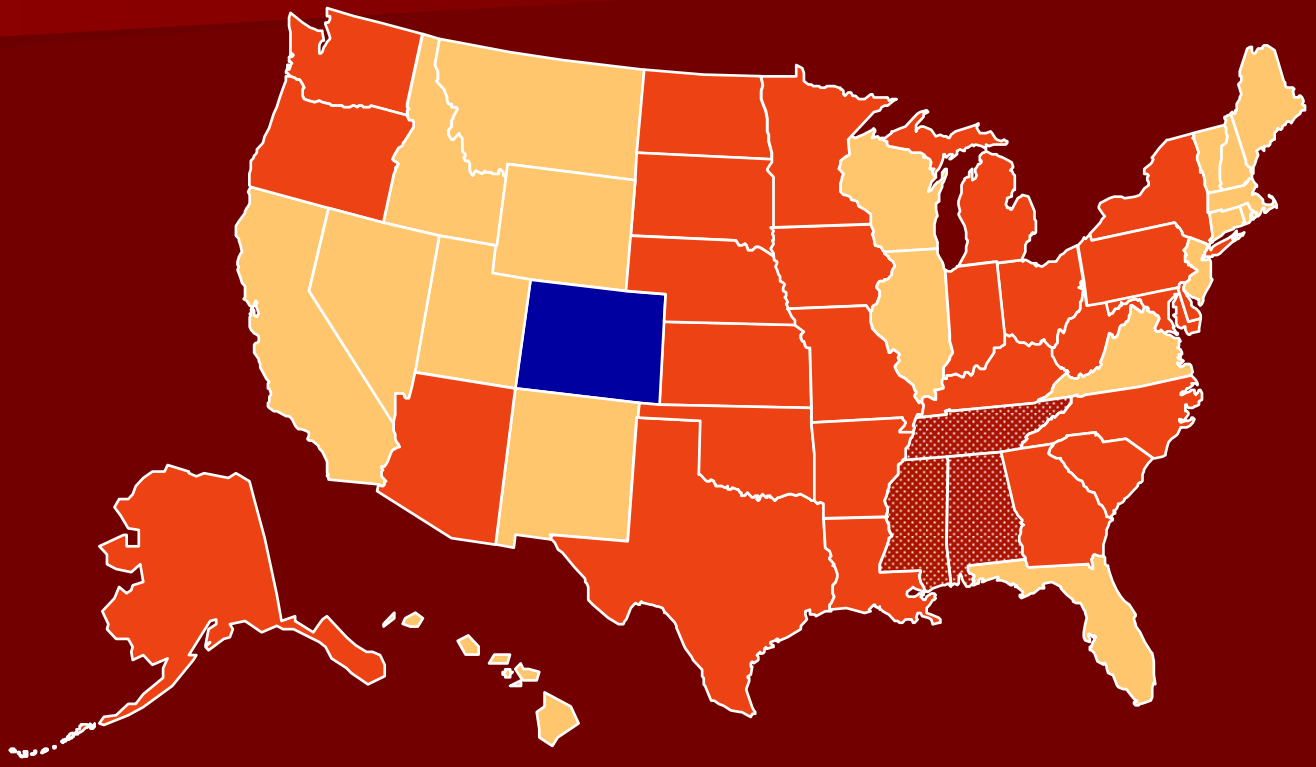
Obesity Trends* Among U.S. Adults

BRFSS, 2007

(*BMI ≥30, or ~ 30 lbs. overweight for 5' 4" person)



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CDC

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300,000 Americans die each year from the combination of poor diet and inactivity....

Physcian Advice

- "Physicians reported spending an average of 8 minutes counseling their patients on lifestyle change at routine annual visits."

- "<5 % of physicians advise patients to engage in physical activity at least 6 days per week as recommended by national guidelines"

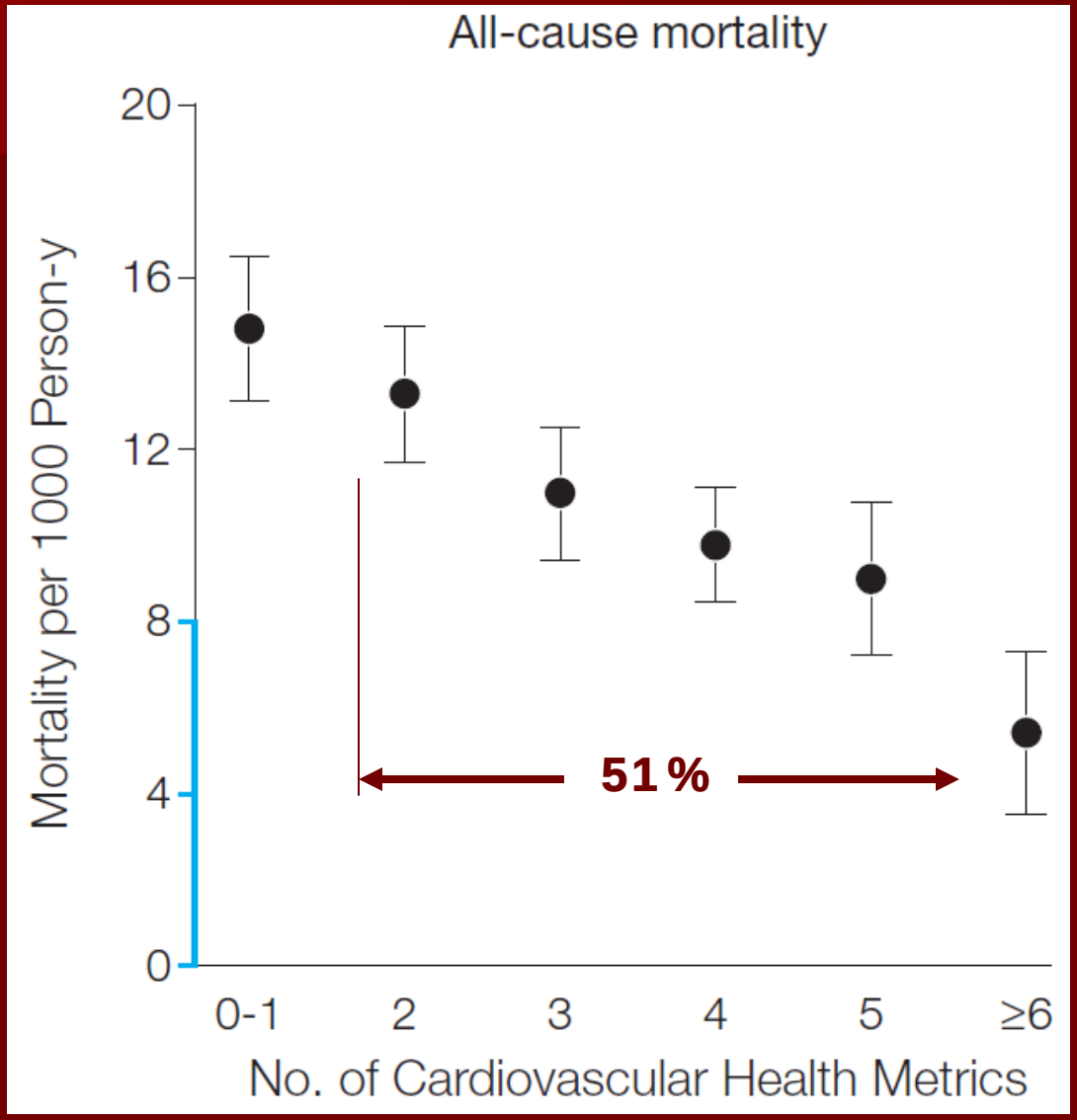
National Study of Physician awareness and Adherence to Cardiovascular Disease Prevention Guidelines, Circ 2005

Cardiovascular Health Metrics

- Evaluated ~50,000 US adults for >20 years
- 7 health metrics:
  - Smoking
  - Physical Activity
    - 3-6 mets 5 or more times per week or >6 mets 3x/wk
  - Healthy diet (1 point each for total 5 points)
    - 4 cups fruit/veg per day, fish 2 per wk, whole grains 3 1 oz svgs/day, <1500 mg sodium /day, 3 or less sweetened beverages per wk
  - Fasting blood glucose (HgbA1c <5.7%)
  - Blood pressure (<120/80 mmHg)
  - Total serum cholesterol (<200 mg/dL)
  - Obesity (BMI <25)

Yang Q et al., *JAMA*. 2012;307(12):DOL:10.1001/*JAMA*.2012.339

Cardiovascular Health Metrics



Yang Q et al., *JAMA*. 2012;307(12):DOL:10.1001/*JAMA*.2012.339

Cardiovascular Health Metrics

- Take away points:
  - Modifying lifestyle continues to show the largest improvements in cardiovascular health
  - <2% of study population met all 7 health metrics
  - Smoking continues to decline in the US
    - However, 1 in 5 (23%) continue to smoke
    - Every 5% increase in smoking cessation results in 7000 less deaths

Yang Q et al., *JAMA*. 2012;307(12):DOL:10.1001/*JAMA*.2012.339

Cardiovascular Health Metrics

- Take away points:
  - Prevalence of obesity and diabetes continue to increase
  - HTN contributed to the largest adjusted cause of all-cause mortality
    - Studies indicate HTN affects 68 million Americans
    - For every 10% increase in HTN treatment, 14,000 lives are saved
    - Primordial prevention of HTN continues to be the best way of affecting BP
      - Sodium, obesity, physical activity, alcohol intake and poor diet

Yang Q et al., *JAMA*. 2012;307(12):DOL:10.1001/*JAMA*.2012.339

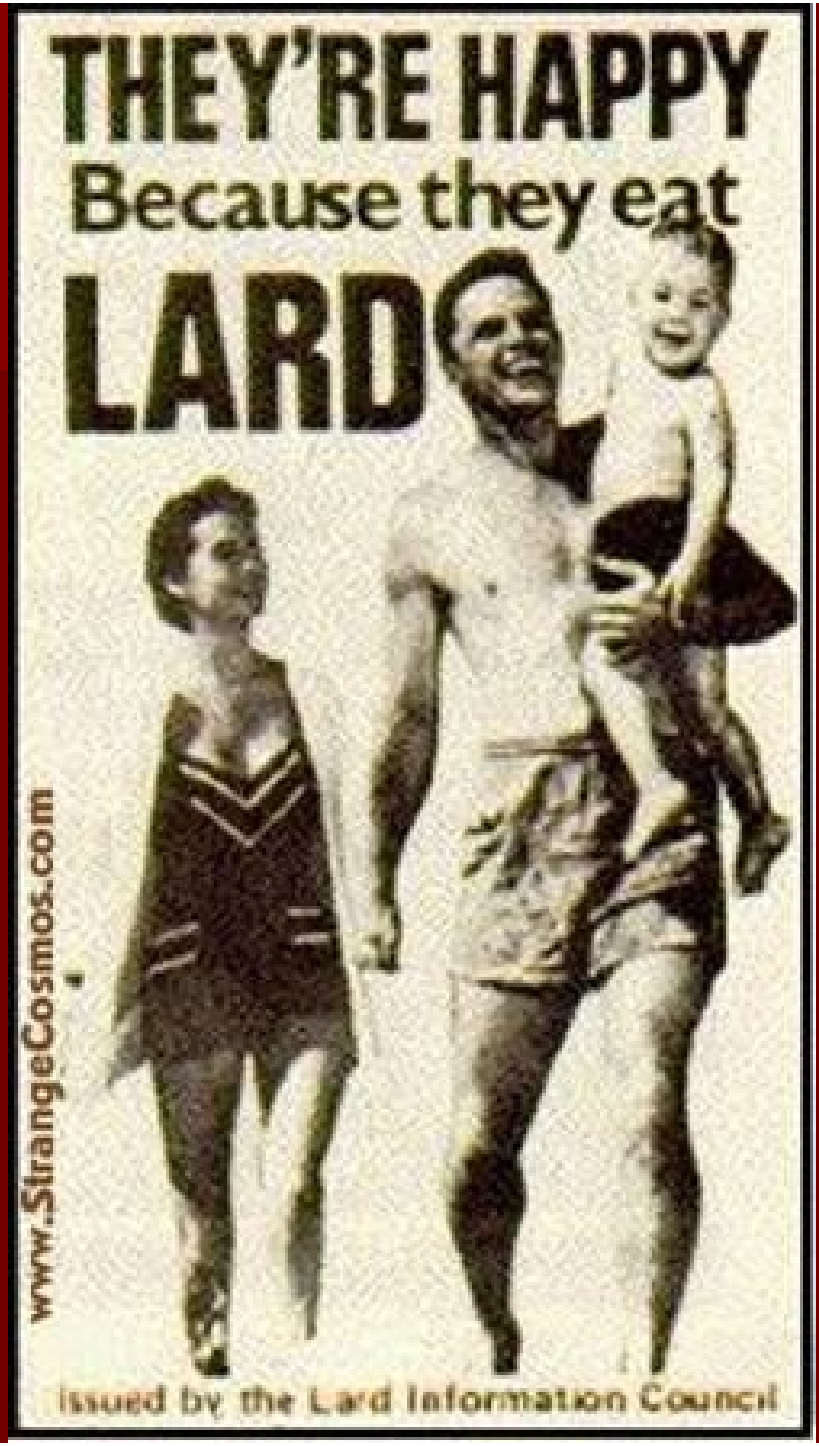
An integrative approach is critical for optimum health because almost all chronic diseases are affected by lifestyle

Modifiable lifestyle factors

- Nutrition
- Exercise
- Weight
- Stress mastery
- Smoking/Alcohol use

Lifestyle Intervention #1

Beware of restaurants and the food industry



Just because they say something is healthy doesn't make it so

Nutrition

- An initial approach to a patient's nutrition should simply start with total caloric consumption
  - The Department of Agriculture reports an 8% increase in food consumption from 1990 to 2000
  - Interestingly, fat calories have reduced but both total calories and obesity have continued to rise

The China Project

- A study looking at the rates of > 50 diseases in rural china Vs. the U.S.
- Fat intake was twice as high in the U.S.
- Fiber intake was three times lower in the U.S.
- Animal protein intake was 90% higher in the U.S.
- Heart disease death rate was 16.7 fold greater for men and 5.6 fold greater for women in the U.S
- Other diseases were also higher in the U.S.:
  - cancers
  - osteoporosis
  - diabetes
  - HTN
  - ref: Campbell, Parpia and Chen; Am J Cardiol, 1998, Nov 26

Even one fatty meal can set you back!

Transient hyperlipidemia causes increased vascular reactivity

Vogel et al Am. J of Cardiology, 79(3):350-354

Greeholdt et al, Circulation 1998;97:34

Kugiyama et al, Circulation 1997;96(sup):I-2207

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Glycemic Index

GLYCEMIC INDEX (GI) OF FOODS

(italicized words fall in the high range of category)

GOOD CHOICE **(Low GI: 55 or less)**	**(Moderate GI: 56-69)**	***PLEASE AVOID/LIMIT*** **(High GI: 70 or higher)**
Breads		
Rye kernel bread	Whole wheat spelt bread	White bread, wheat bread
Barley kernel bread	Whole-grain pumpernickel	Bagels, baguettes
Whole wheat kernel bread	Cracked-wheat kernel bread	Middle Eastern flatbread
Natural Ovens 100% Whole-Grain	100% whole wheat bread	Natural Ovens English Muffin bread
	Healthy Choice 100% Whole Grain/Hearty 7 Grain	Hamburger buns
	Corn tortillas, wheat tortillas	Gluten-free white bread
	Oat bran bread	Rice bread
	Pita bread	
Breakfast Cereals		
All-Bran	Toasted muesli	Cheerios, Rice/Corn Chex,
Fiber One	Bran Chex	Instant Oatmeal/Cream of Wheat
Rice bran	Oatmeal (slow cook)	Grapenuts, Grapenuts Flakes
Oat bran	Kashi Go LEAN	Rice Krispies, Cornflakes
	Kashi Good Friends	Bran Flakes, Corn Bran
	Nutrigrain	Total, Shredded Wheat
	Raisin Bran	Puffed Wheat, Corn Pops
	Mini Wheats, whole wheat	Sugary cereals, Granola
	Special K	Weetabix

Glycemic Index

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(italicized words fall in the high range of category)

GOOD CHOICE **(Low GI: 55 or less)**	**(Moderate GI: 56-69)**	***PLEASE AVOID/LIMIT*** **(High GI: 70 or higher)**
Cereal Grains (cooked)		
Pearled/cracked barley	Rolled barley	Millet
Whole kernel wheat/rye	Basmati rice	White rice
Buckwheat, brown rice	Long grain rice (boiled 10 minutes)	Quick-cooking rice
Bulgur (cracked wheat)	*Cornmeal*	Jasmine white rice
Buckwheat groats	*Couscous*	Parboiled rice
Semolina		
Dairy		
Plain lowfat/nonfat yogurt	Lowfat/nonfat fruit yogurt	Frozen yogurt
Nonfat milk, soy milk		Tofu frozen dessert
Fruit		
Apple, Berries	~~Apple juice (unsweetened)~~	Cranberry juice cocktail
Cherries, Grapes	Banana	Canned peaches in syrup
Grapefruit	Cantaloupe, Kiwi	Dates, Raisins
Orange	Mango	Watermelon
Peach, Pear	*Pineapple*, Papaya	**AVOID FRUIT JUICES**
Plum, Dried apricots	~~Orange juice (unsweetened)~~	
	~~Grapefruit juice (unsweetened)~~	
	~~Carrot juice (fresh)~~	

Glycemic Index

GOOD CHOICE (Low GI: 55 or less)	(Moderate GI: 56-69)	*PLEASE AVOID/LIMIT* (High GI: 70 or higher)
Legumes		
Chickpeas/garbanzo beans	Navy beans	Navy beans (pressure cooked 25 minutes)
Lentils, Romano beans		Canned baked beans
Black-eyed beans/peas		Broad beans
Pinto beans, Black beans		
Baby lima beans		
Kidney beans		
Soy beans, split peas		
Mung beans		
Pasta		
Fettuccini, egg-enriched	Capellini	Rice noodles/pasta
Spaghetti, protein-enriched	Spaghetti (cooked al dente)	Spaghetti (boiled more than 20 minutes)
Spaghetti, whole meal (whole wheat)	Macaroni (boiled 5 min)	Gnocchi
	Linguini	
	Udon noodles	

Glycemic Index

GOOD CHOICE **(Low GI: 55 or less)**	**(Moderate GI: 56-69)**	***PLEASE AVOID/LIMIT*** **(High GI: 70 or higher)**
Vegetables		
Asparagus, Broccoli,	Beets	Instant potatoes
Brussels sprouts,	Green peas	Russet potato
Bok choy, Cabbage,	Sweet corn	New potato
Carrots, Cauliflower,	Yam	French fries
Dark leafy greens,	*Sweet potato*	Winter squash
Eggplant, Mushrooms,		Pumpkin
Peppers, Romaine lettuce,		
Spinach, Snow peas, Summer squash		
Tomatoes, Tomato juice, Zucchini		
Soups		
Tomato	Black bean, Green pea	
Lentil	Split pea	
Minestrone		
Snack Foods		
Peanuts	Rye crispbread crackers	Jelly beans, Life Savers, Mars Bars,
Almonds	Power Bar	Muesli bars, Popcorn, Corn chips,
Walnuts	Breton wheat crackers	Potato chips, Pretzels, Melba Toast,
Nuts and seeds		Water/soda crackers, Rice cakes
		Breakfast cereal bars, Cookies
		Skittles, Gatorade

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LYON Heart Study

5 year randomized control with 605 CHD patients

More Fruit

More Beans

More Veggies

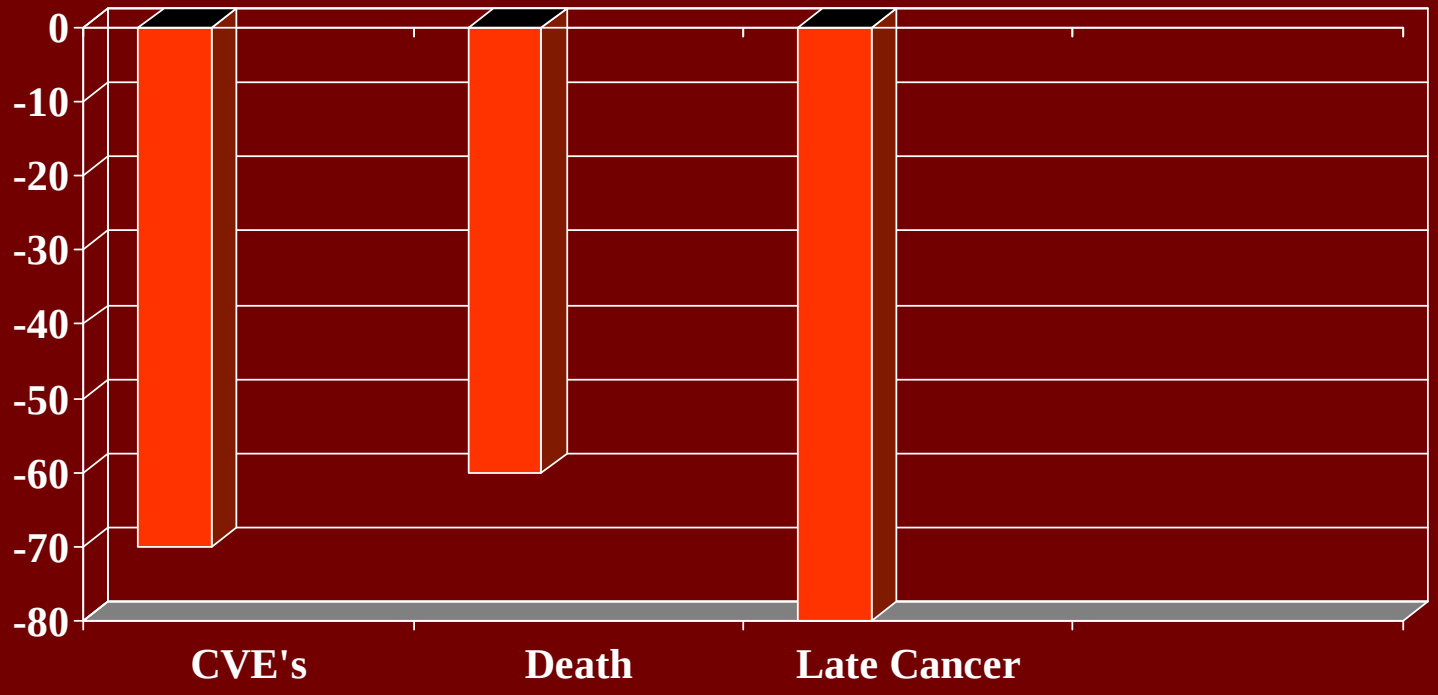
More Fish

Less Meat

No cream

No Butter

Canola Oil



*deLongeril et al, Am.J Clin.Nutr;*1995:61

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ORIGINAL CONTRIBUTION

Mediterranean Diet, Lifestyle Factors, and 10-Year Mortality in Elderly European Men and Women

The HALE Project

Kim T. B. Knoops, MSc
Lisette C. P. G. M. de Groot, PhD
Daan Kromhout, PhD
Anne-Elisabeth Perrin, MD, MSc
Olga Moreiras-Varela, PhD
Alessandro Menotti, MD, PhD
Wija A. van Staveren, PhD

Context Dietary patterns ar
causes, coronary heart diseas
have investigated these factor

Objective To investigate the
physically active, moderate a
specific mortality in European

Design, Setting, and Parti
Europe (HALE) population, co
Nutrition and the Elderly: a C
Netherlands, Elderly (FINE) st

THE NUMBER OF OLDER PEOPLE IS

ORIGINAL CONTRIBUTION

Effect of a Mediterranean-Style Diet on Endothelial Dysfunction and Markers of Vascular Inflammation in the Metabolic Syndrome

A Randomized Trial

ARTICLE

Context The metabolic syndrome has been identified as a target for dietary therapies to reduce risk of cardiovascular disease; however, the role of diet in the etiology of the metabolic syndrome is poorly understood.

Objective To assess the effect of a Mediterranean-style diet on endothelial function and vascular inflammatory markers in patients with the metabolic syndrome.

Design, Setting, and Patients Randomized, single-blind trial conducted from

The Effect of Fruit and Vegetable Intake on Risk for Coronary Heart Disease

Kaumudi J. Joshipura, ScD; Frank B. Hu, MD; JoAnn E. Manson, MD; Meir J. Stampfer, MD; Eric B. Rimm, ScD; Frank E. Speize
Graham Colditz, MD; Alberto Ascherio, MD; Bernard Rosner, PhD; Donna Spiegelman, ScD; and Walter C. Willett, MD

Background: Many constituents of fruits and vegetables may reduce the risk for coronary heart disease, but data on the relationship between fruit and vegetable consumption and risk for

Results: After adjustment for standard cardiovascu
persons in the highest quintile of fruit and vegetab
relative risk for coronary heart disease of 0.80 (9

Protective Effect of Fruits and Vegetables on Development of Stroke in Men

Matthew W. Gillman, MD; L. Adrienne Cupples, PhD; David Gagnon, MD; Barbara Millen Posner, DrPH;
R. Curtis Ellison, MD; William P. Castelli, MD; Philip A. Wolf, MD

Objective.—To examine the effect of fruit and vegetable intake on risk of stroke among middle-aged men over 20 years of follow-up.

Design.—Cohort.

Setting.—The Framingham Study, a population-based longitudinal study.

Participants.—All 832 men, aged 45 through 65 years, who were free of cardiovascular disease at baseline (1966 through 1969).

levels, suggesting a protective role for dietary antioxidant vitamins. Preliminary data from the Nurses' Health Study agree with these findings.[7] Khaw and Barrett-Connor[8] reported an inverse association of potassium intake, irrespective of hy-

The HALE Project

The **H**ealthy **A**geing: a **L**ongitudinal study in **E**urope population

- 1507 apparently healthy men and 832 women
- Aged 70 to 90 years
- 11 European countries

JAMA. 2004;292:1433-1439

The HALE Project

Objective: To investigate the single and combined effect of Mediterranean diet, being physically active, moderate alcohol use, and nonsmoking on all-cause and cause-specific mortality in European elderly individuals

JAMA. 2004;292:1433-1439

The HALE Project

Conclusions: Among individuals aged 70 to 90 years, adherence to a Mediterranean diet and healthful lifestyle is associated with a more than 50% lower rate of all-cause death and cause-specific mortality

JAMA. 2004;292:1433-1439

“Let Food Be Thy Medicine”

- Green Leafy Veggies: spinach etc.
- Berries: Blueberries #1 antiox.
- Beans, Nuts and Seeds
- Nonfat Yogurt with active cultures
- SOY: soybeans, tofu and miso
- Carotenoid Rich Food: pumpkin, carrots, peach
- Low glycemic Index Foods
- Omega three Fatty acids: wild salmon, trout
- Healthy Fat: almonds,walnuts,olive,avocado,flax
- Foods High in Lycopene
- Cruciferous Veggies: Broccoli,kale,brussel sprouts
- Whole Grains (No white flour)

Nutrition

- A review of 147 epidemiological and dietary intervention studies concluded these principles for prevention of cardiovascular disease:
  1. Increase consumption of omega-3 fatty acids from fish, fish oil supplements, and plant sources
  2. Substitute nonhydrogenated unsaturated fats for saturated and trans fats
  3. Consume a diet high in fruits, vegetables, nuts, and whole grains, and low in sugar and refined grain products

-Hu FB, Wilett WC. JAMA. 2002;288:2569-78

Nutrition & Heart Failure/HTN

Salt

Sodium

NaCl

Nutrition & Heart Failure/HTN

- Sodium < 1500mg / day
- Refer to a nutritionist
  - However, invest time personally counseling
- Help patients understand food labels
- Have a list of the sodium content of popular foods
- Recipes

Nutrition and Heart Failure/HTN

- Spicy Blend
  - 2 tbsp dried savory, crumbled
  - 1/4 tsp freshly ground white pepper
  - 1 tbsp dry mustard
  - 1/4 tsp ground cumin
  - 2 1/2 tsp onion powder
  - 1/2 tsp garlic powder
  - 1/4 tsp curry powder
- Spicy Seasoning
  - 1 tsp cloves
  - 1 tsp pepper
  - 1 tsp paprika
  - 1 tsp coriander seed (crushed)
  - 1 tbsp rosemary
- Saltless Surprise
  - 2 tsp garlic powder
  - 1 tsp basil
  - 1 tsp oregano
  - 1 tsp powdered lemon rind or dehydrated lemon juice
- Herb Seasoning
  - 2 tbsp dried dill weed or basil leaves, crumbled
  - 1 tsp celery seed
  - 2 tbsp onion powder
  - 1/4 tsp (pinch) dried oregano leaves, crumbled freshly ground pepper

Lifestyle Intervention #2

No Diet is healthy without exercise!!!

Public Health Issue

- There are an estimated 200,000 deaths annually in the US related to a sedentary lifestyle
  - Leading related deaths are CAD, colon cancer, and type 2 DM
- Conversely, regular physical activity and higher cardiorespiratory fitness decrease overall mortality in a dose-related fashion
  - Multiple observational trials
  - Meta-analysis
    - Taylor RS, et al. Am J Med. 2004;116:682-692
- NHANES study
  - Low fitness determined by submaximal stress test in an adolescent and adult population free of CVD (n=5315) correlates with increased prevalence of CVD

Public Health Issue

- Most Americans have little or no physical activity in their daily lives
  - ~25% of adults in US do not engage in any leisure time physical activity
  - <15% exercise for 30 mins 3 or more days per week

Average American watches 30 hours of television per week!

- #1 excuse for not exercising is:

  Not enough Time

Exercise Prescription

- Healthy individuals:
  - Exerci
  - 30-60
  - Shoul
    - How
      acce

Level of exertion correlates to HR

6 No exertion at all
7 Extremely light
8
9 Very light - (easy walking slowly at a comfortable pace)
10
11 Light
12
13 Somewhat hard (It is quite an effort; you feel tired but can continue)
14
15 Hard (heavy)
16
17 Very hard (very strenuous, and you are very fatigued)
18
19 Extremely hard (You can not continue for long at this pace)
20 Maximal exertion

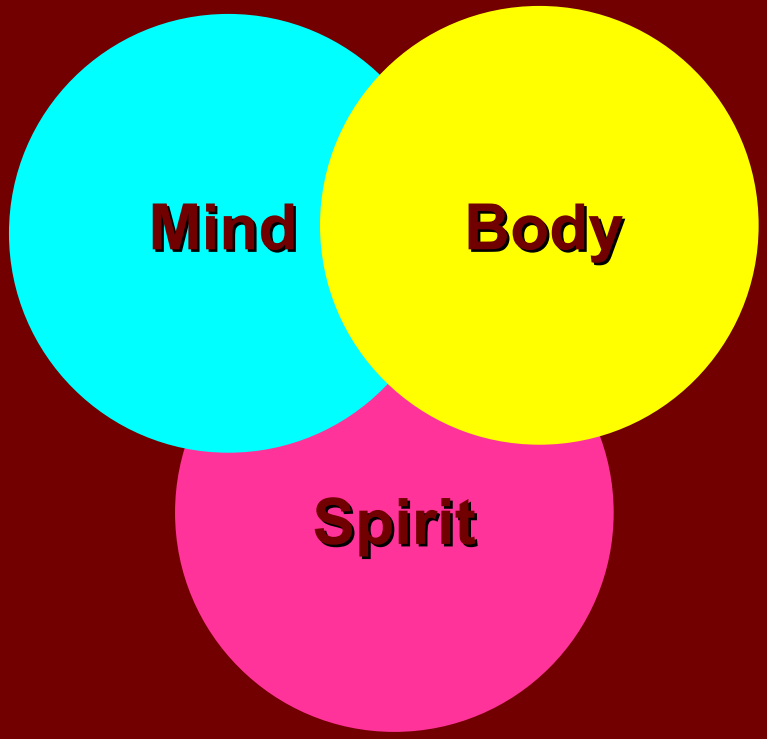
Exercise Resistant

5 Minutes to Exercise

- Must exercise every day
  - Cannot miss
- Only 5 minutes daily for 30 days
  - Then increase by 5 minutes/day every month
- Any pace
- Any type of aerobic exercise
- If bored then increase pace, not time

Lifestyle
Lesson #3

Stress



The mental and emotional aspects of healing cannot be separated from the physical

Fight or Flight Reaction

- Prepares us for physical confrontation
- Respond to acute hemodynamic collapse or respiratory compromise

- When the sympathetic nervous system is used in this way it increases our chance of survival and the likelihood that our genes will be passed on to the next generation

The Stress Response

Day-to-Day Life

Interact
Meet time deadlines
Drive in traffic
Pay bills/make decisions

Sensory overload relayed to the brain

↓

Brain interprets a threat to the body

↓

Hypothalamus stimulated

↓

Sympathetic system discharged

The Stress Response

Stress Hormones

Cortisol

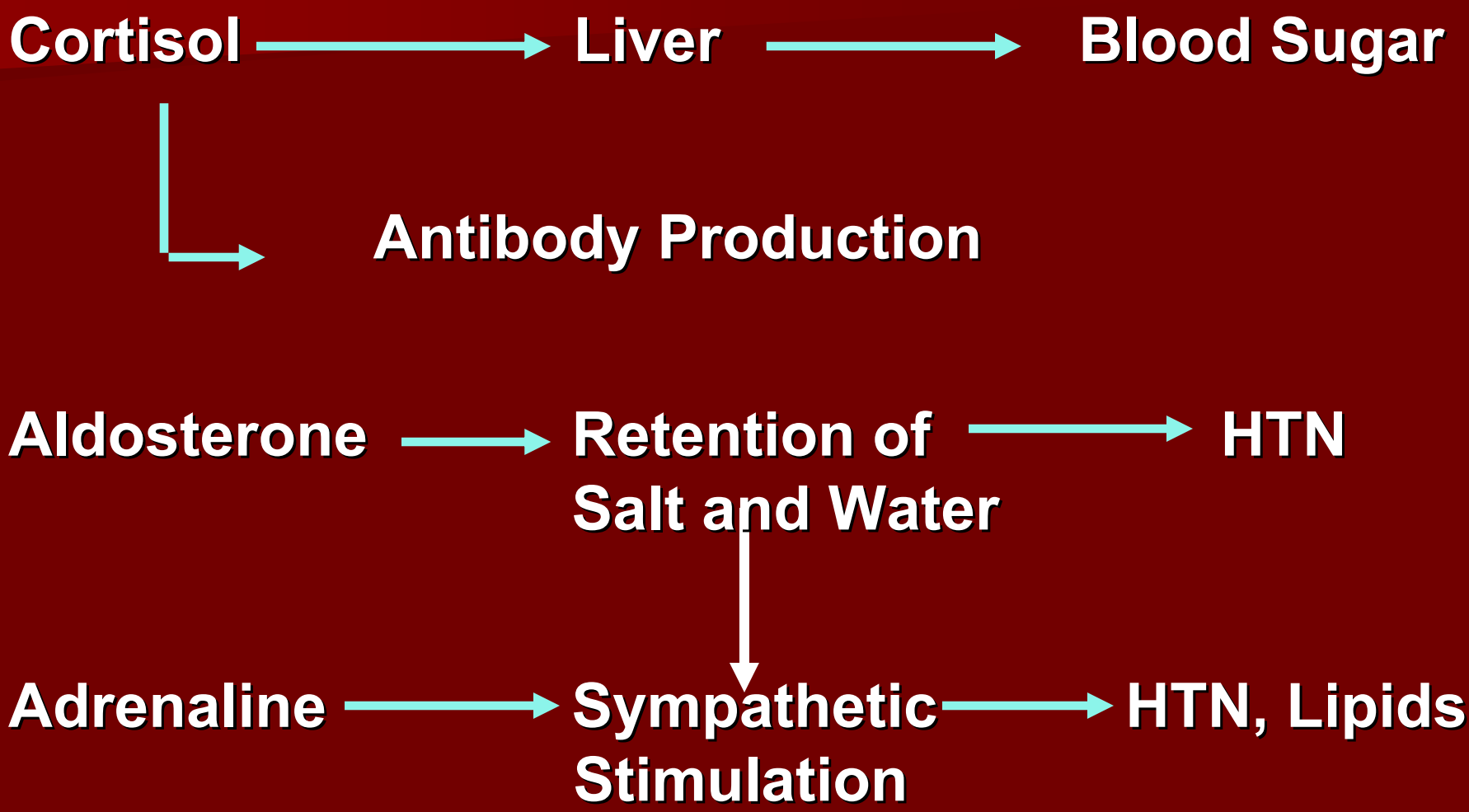
Aldosterone

Adrenaline

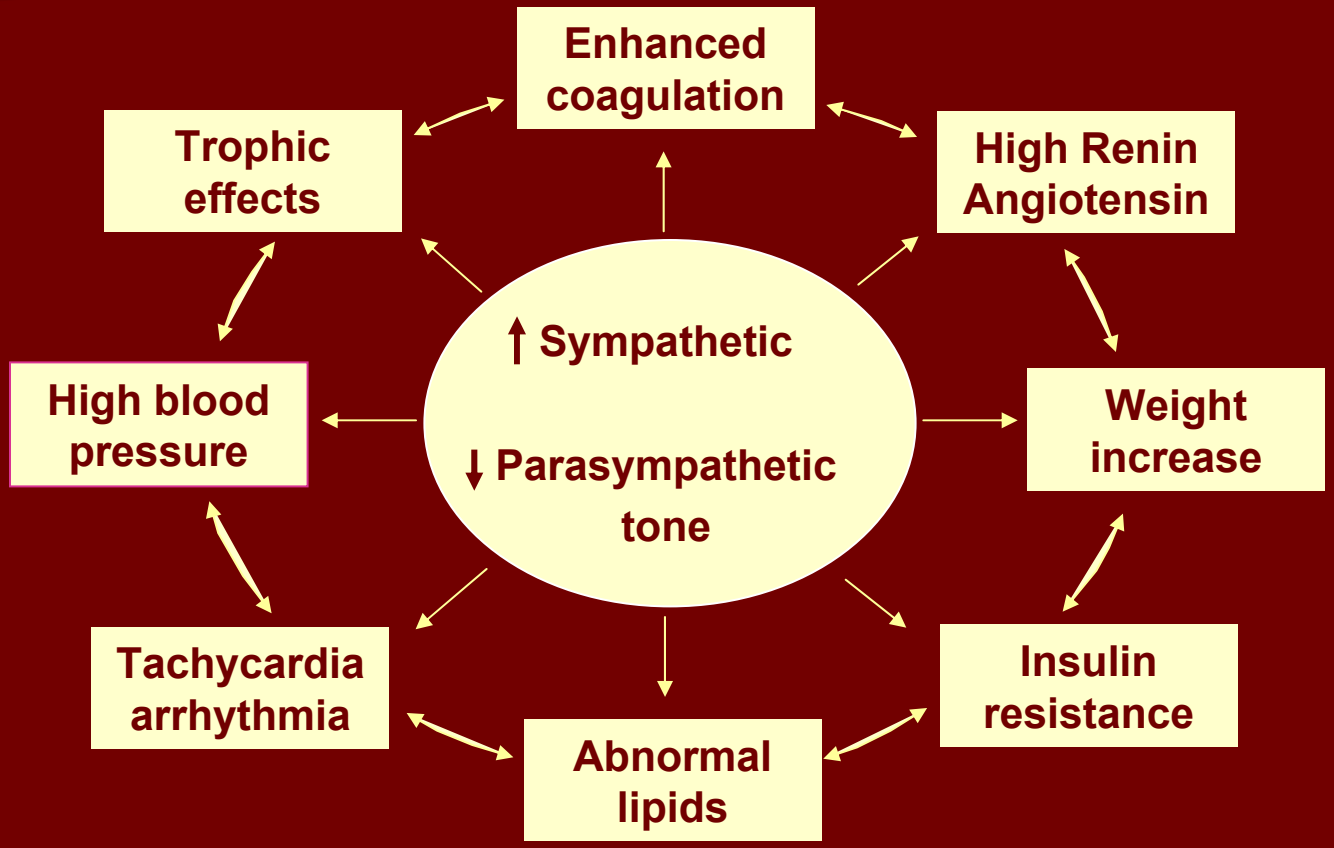
↓

Released into the bloodstream

The Stress Response



Stress Response



INTERHEART: Focus on 9 risk or protective factors

Design Large international case-control study

Participants 12,461 cases; 14,637 controls; 52 countries

Objective To determine association of first MI with:

Smoking	Lipids	Hypertension
Diabetes	Obesity	Diet
Physical activity	Alcohol consumption	Psychosocial factors*

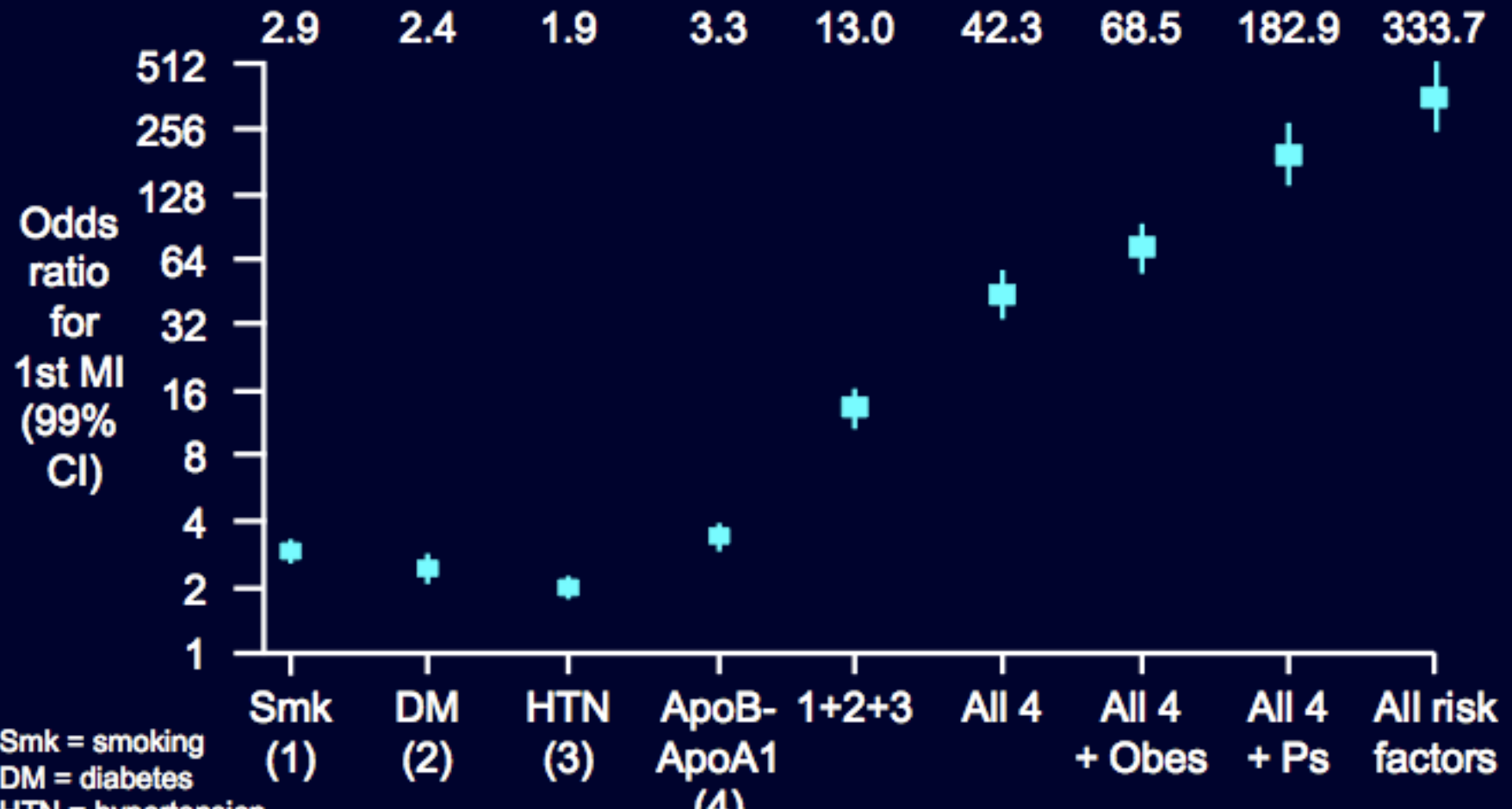
Follow-up 4 years, February 1999–March 2003

*eg, stress, depression

Yusuf S et al. *Lancet*. 2004;364:937-52.

VBWG

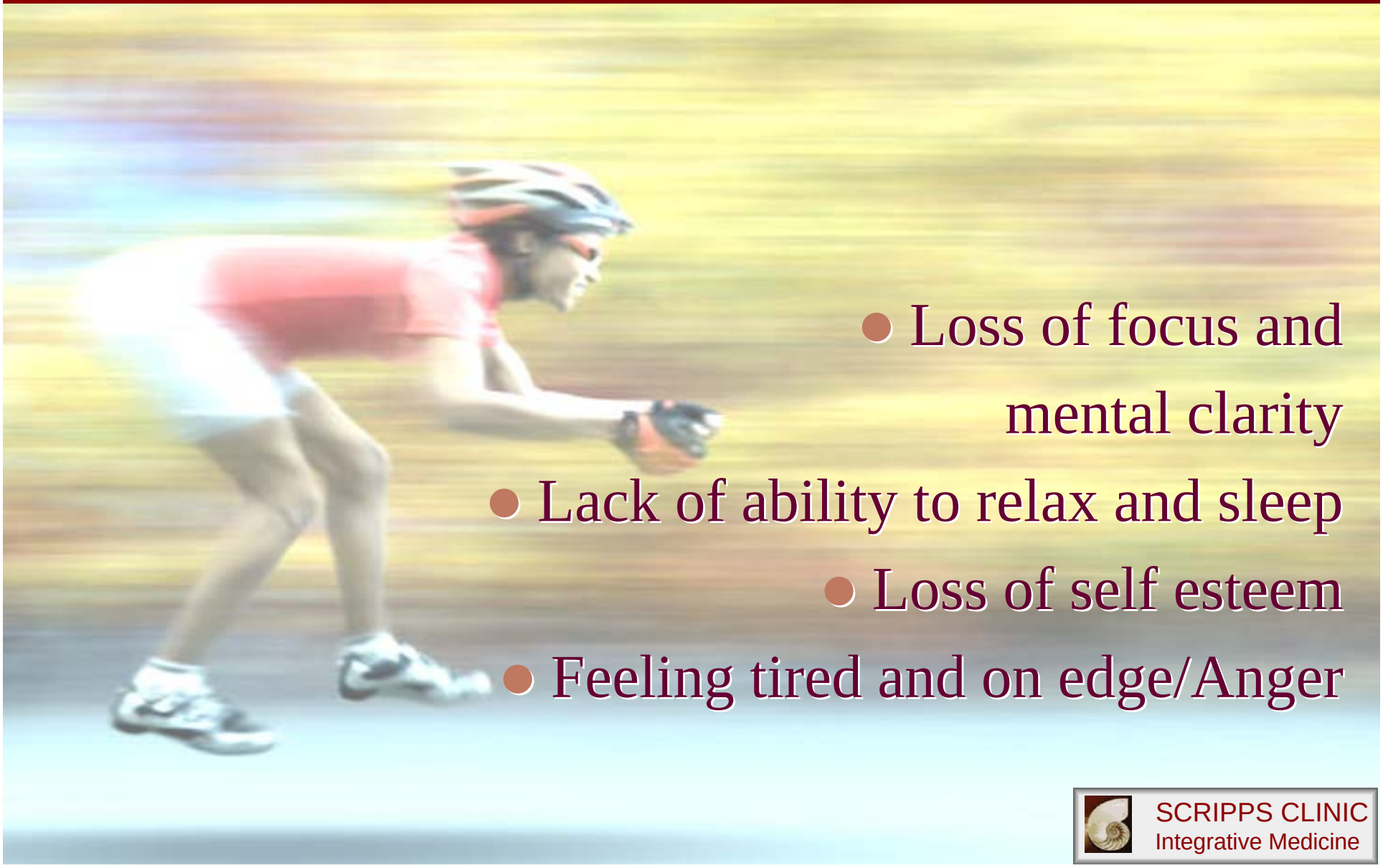
INTERHEART: Impact of multiple risk factors on CV risk



Smk = smoking
DM = diabetes
HTN = hypertension
Obes = obesity
Ps = psychosocial factors
Note: odds ratio plotted on a doubling scale

Yusuf S et al. *Lancet*. 2004;364:937-52.

Warning Signs



- Loss of focus and mental clarity
- Lack of ability to relax and sleep
- Loss of self esteem
- Feeling tired and on edge/Anger

SCRIPPS CLINIC
Integrative Medicine

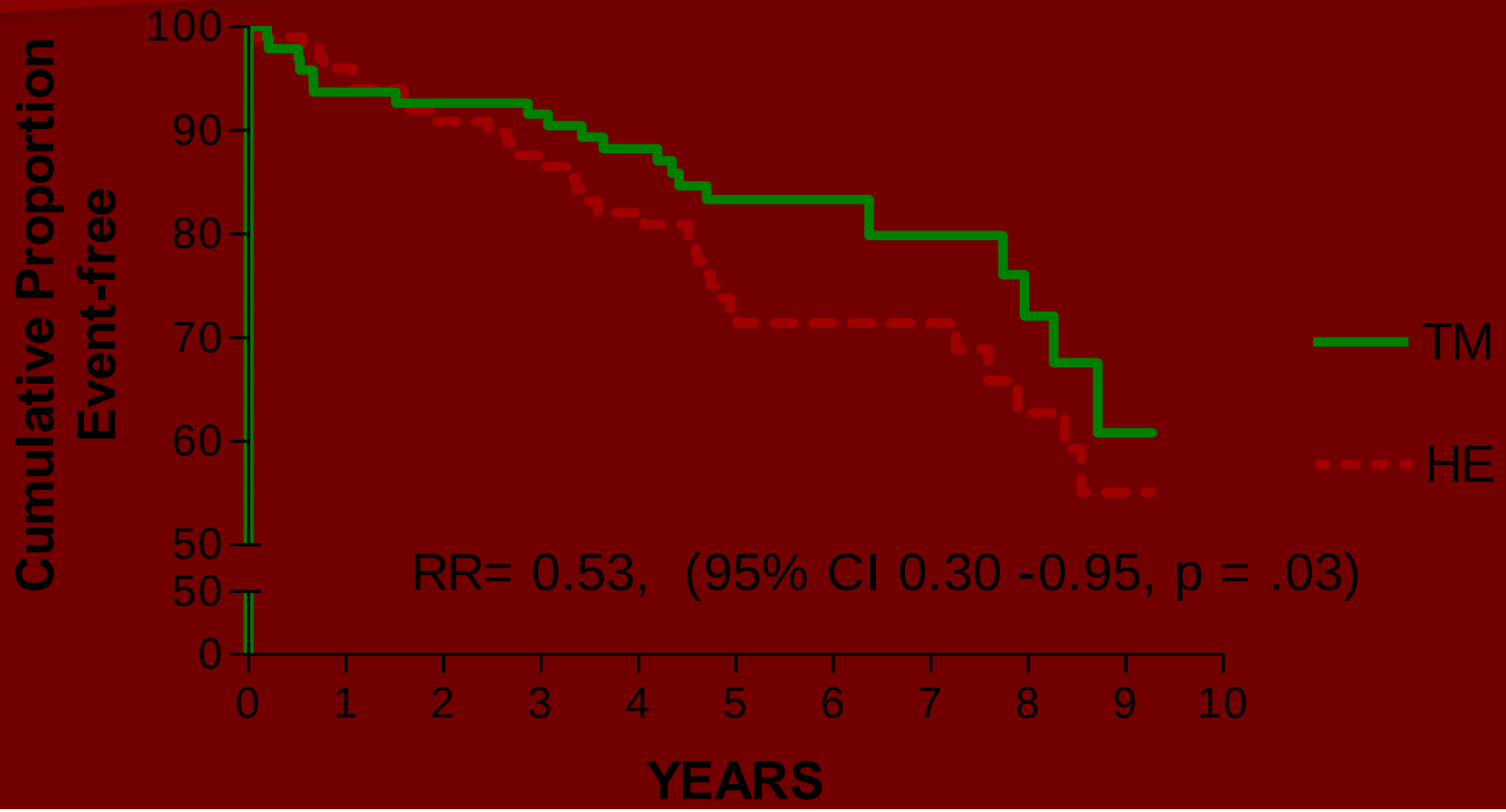
The Power of Positive Emotions

- Increased longevity *(Danner et al., 2001)*
- Reduced morbidity *(Goldman et al, 1996; Russek & Schwartz, 1997)*
- Increased cognitive flexibility *(Ashby et al., 1999)*
- Improved memory *(Isen et al., 1978)*
- Improved decision making *(Carnevale & Isen, 1986)*
- Increased creativity and innovative problem solving *(Isen et al., 1987)*
- Improved job performance & achievement *(Wright & Staw, 1994; Staw et al.,1994)*
- Improved clinical problem solving *(Estrada et al.,1997)*

Meditation

- ↓ Breathing rate
- ↓ Heart rate
- ↓ Blood pressure
- ↓ Need for oxygen
- ↑ Endorphins
- ↓ Inreases concentration

Effects of Transcendental Meditation on Mortality, MI, and Stroke: A Randomized Controlled Trial



Schneider R, Nidich S, Kotchen J, Kotchen T, Grim C, Rainforth M, Gaylord- King C, Salerno J. Effects of Stress Reduction on Clinical Events in African Americans with Coronary Heart Disease: A Randomized Controlled Trial. *Circulation.* 2009;120:S461

BreathWork

- Heart Focus
- Heart Breathing
- Heart Feeling

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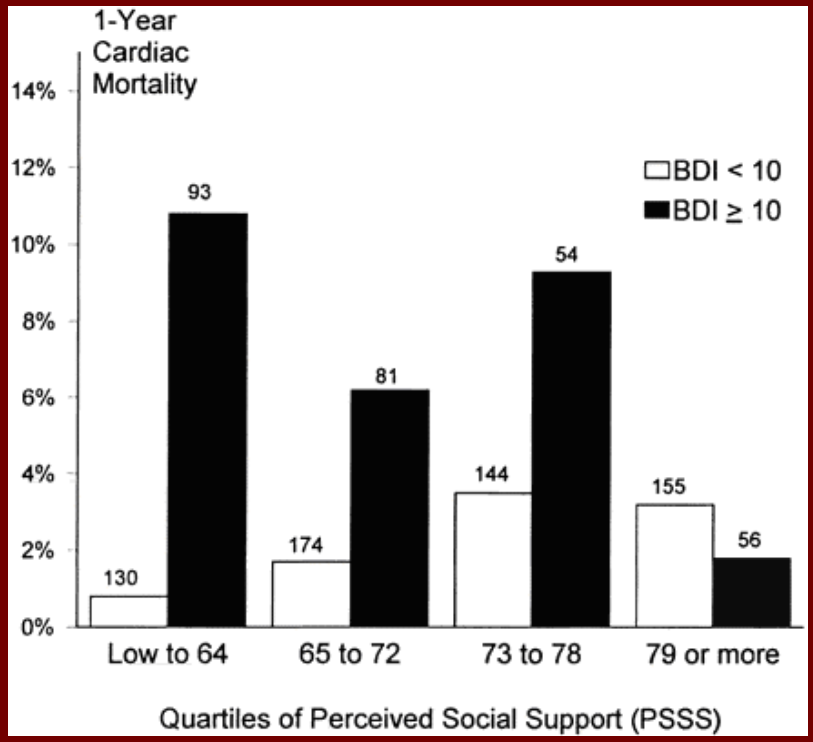
Integrative Medicine

Social Support, Depression and Cardiac Death Rates

- This effect was negated when people felt socially supported
  - Frasure-Smith et al, Circulation, 2000 vol. 101



Turning Stress Into Strength

- Exercise: Preferable in Nature
- Laughter
- Guided Imagery
- Meditation and Yoga
- Breath Work
- Mudras and Mantras
- Practice Appreciation
- Don’t Make Assumptions
- Get Plenty of Sleep and Avoid Excess Caffeine
- Practice Effective Communication
- Prayer
- Love and Social Support

Dietary Supplements

Dietary Supplements

Food and Nutrition Information Center
National Agricultural Library USDA, 10301 Baltimore Ave., Room 105 Beltsville, MD 20705-2351

Dietary Supplements: General Resources for Consumers
June 2010

http://www.nal.usda.gov/fnic/pubs/bibs/gen/dietarysupplementsconsumers.pdf

Dietary Supplements Resources for the Consumer

Office of Dietary Supplements
- http://dietary-supplements.info.nih.gov

- Consumer -
  - Medline Plus http://medlineplus.gov
  - USDA http://www.nutrition.gov

- Natural Medicine Comprehensive Database – Consumer Version
  - WWW.NaturalDatabase.com

Dietary Supplements Education & CME

- Conferences
  - Natural Supplements: An Evidence Based Update
  - Science & Application of Integrative Holistic Medicine
    - www.Scrippsintegrativemedicine.org
- *NCCAM* CAM Online CME
  - *http://nccam.nih.gov/training/videolectures*
- *Fellowship Training: University of Arizona*
  - *http://integrativemedicine.arizona.edu*
- Consortium of Academic Health Centers for Integrative Medicine
  - http://www.ahc.umn.edu/cahcim

Conclusion

- Integrative medicine treats the whole person using all appropriate therapeutic approaches, healthcare professionals and disciplines to achieve optimal health and healing.
  - It is not alternative medicine
- A focus on lifestyle modification is paramount to preventing, improving and reversing most diseases
- Encouraged to have an open but cautious mind to various new treatment options