

Eating Disorders



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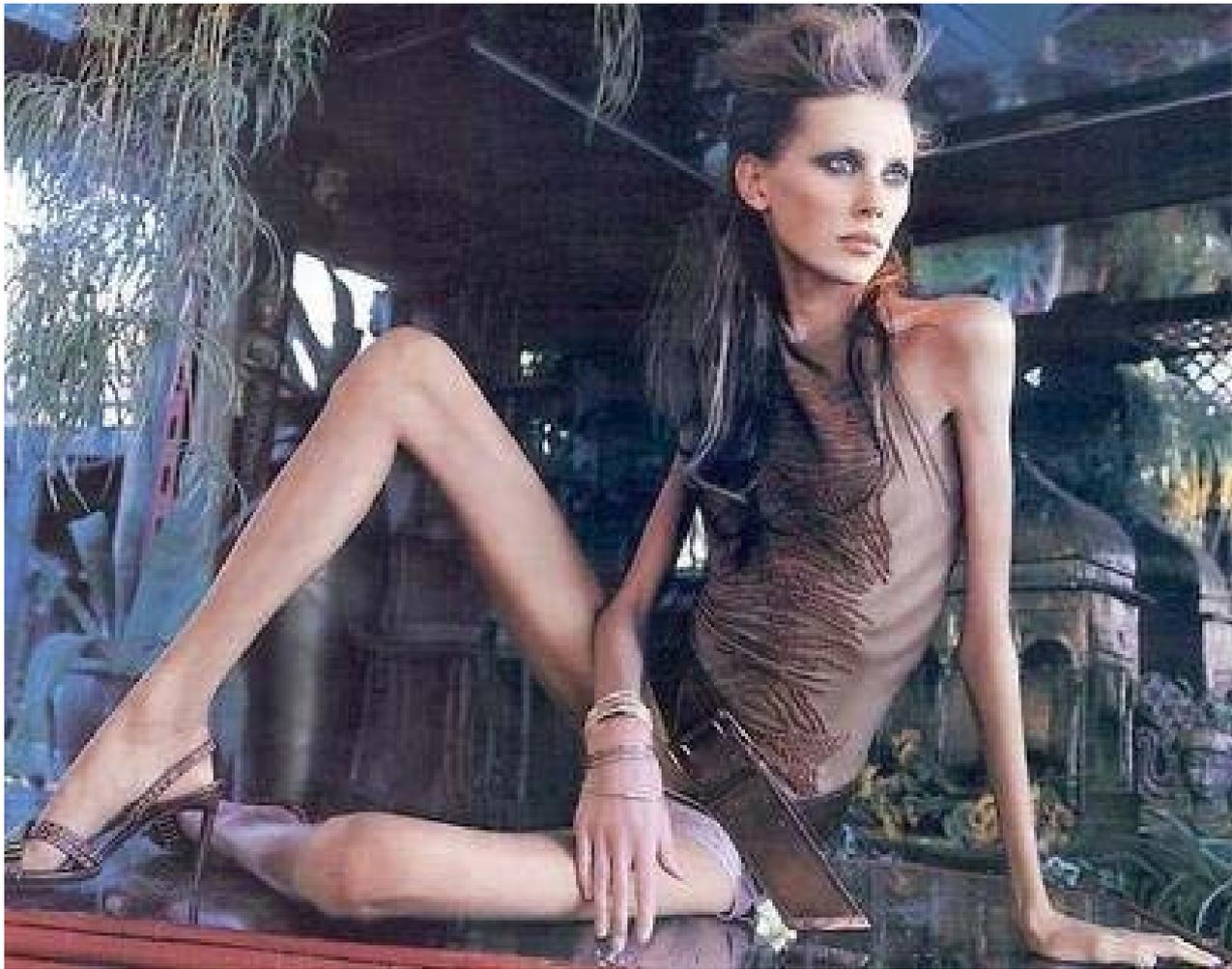
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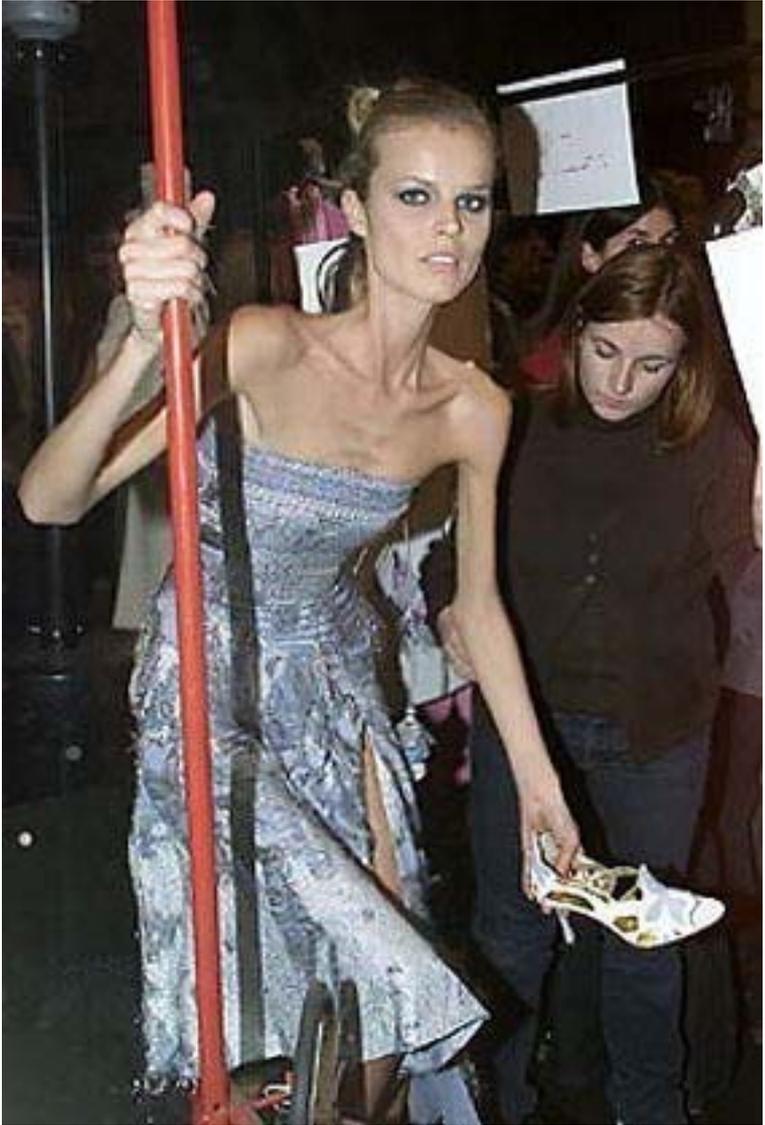


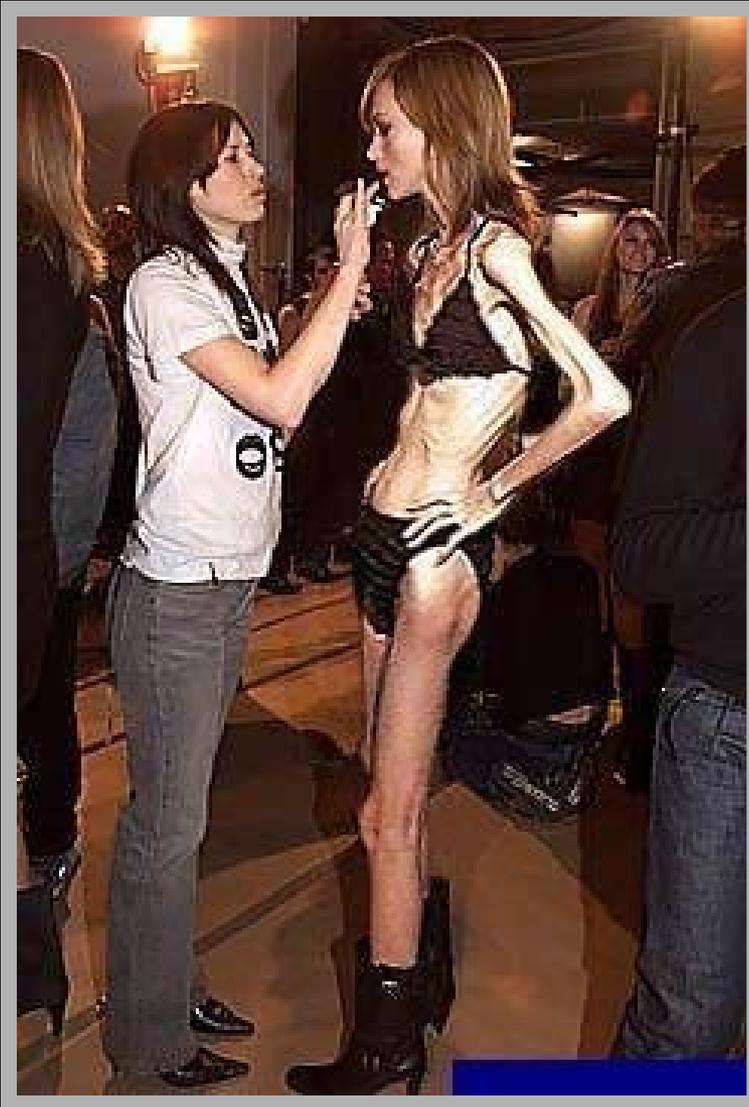






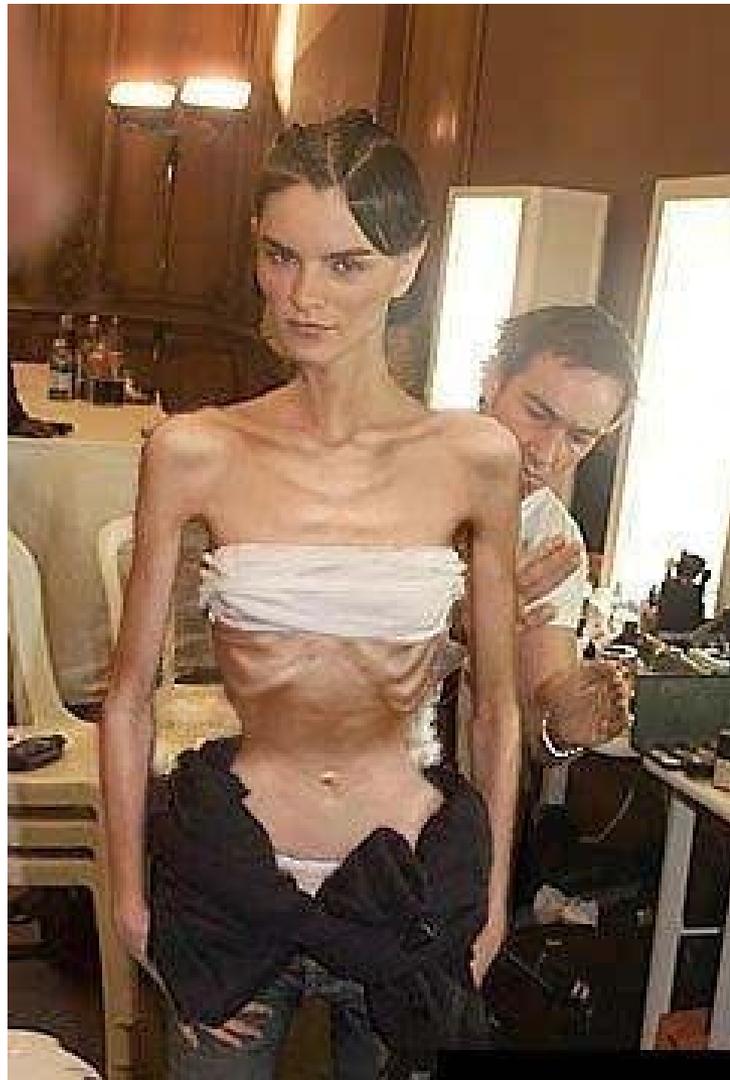














Relaxed atmosphere, feel free to ask questions at any time

Why is this Important?

Reason 1

Eating disorders are a spectrum of problems from just being a “finicky” eater, all the way to the more severe behaviors we associate with an eating disorder.

The majority of teen girls have at least thought about it, and some have given more thought to it than others.

But, A small percent of the teen population is very much caught up in it.

Why is this Important?

Reason 2

For those students who are thinking about the activities associated with an eating disorder, or those who are already trying out some behaviors associated with an eating disorder, what you absolutely must know, and tell your child is that it will eventually kill them!!!

Not maybe it will kill then,it *will* kill them!!!

Why is this Important?

Reason 3

I personally know individuals first hand who have shared with me what living with an eating disorder is like.

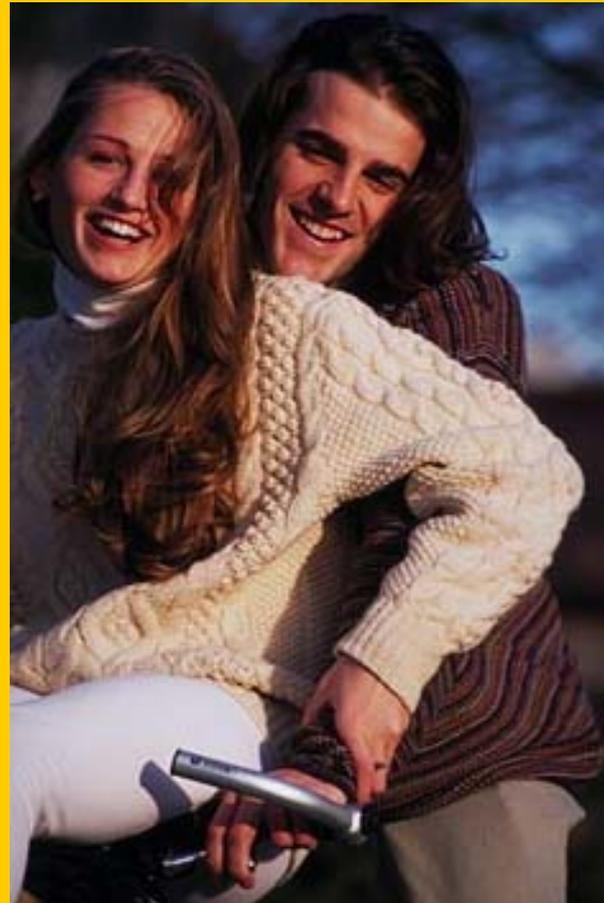
This is just not a subject that it seems “right” to talk about out loud.

Almost all who suffer from an eating disorder keep it a private matter!



Scope of the problem

- Between 5-10 million females and
- Up to one million males in the United States are fighting a life and death battle with an eating disorder.



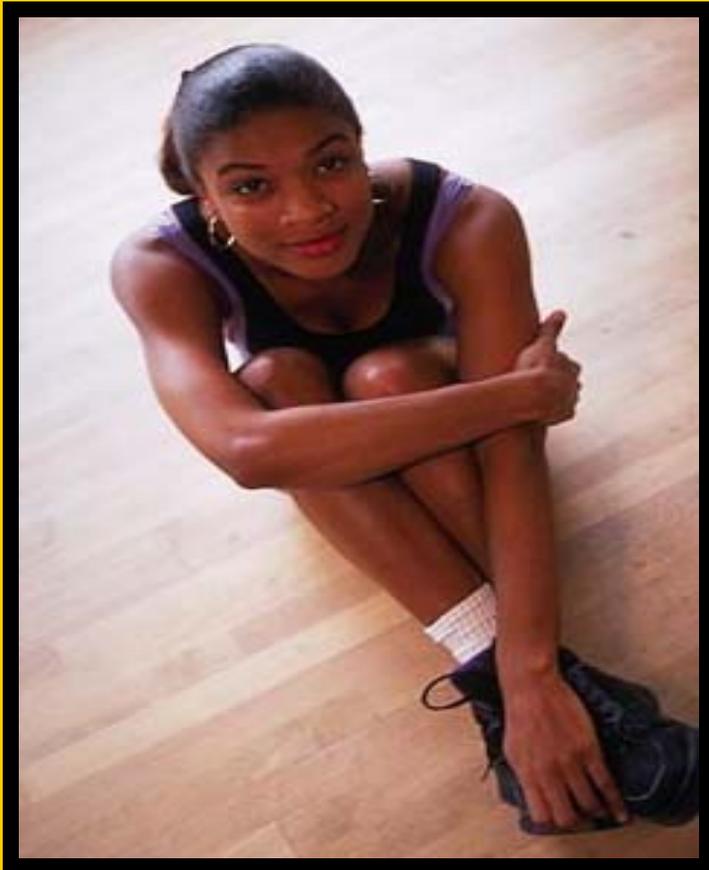
Anorexia and Bulimia



Most eating disorders start in high school, but some 10 year olds are reported to be thinking about dangerous ways to control their weight.



Two people with eating disorders shared with me that.....



- While people looked at them in a certain way because they were obviously thin, the subject was never brought up by others.
- They did not ask, “Do you have an eating disorder”?
- People occasionally commented about how thin they were.
- Even physicians tended only to say “You are too skinny, you need to gain weight!”
- Coaches, teachers, and counselors never brought up the subject and they knew they knew

Parents, school officials, and health care providers don't understand why:



- A girl who looks like a prisoner of war does not see her emaciated body as everyone else sees it.
- A person would starve themselves literally for days without apparent acknowledgment of being hungry.
- A person would eat essentially everything in the refrigerator, then after vomiting, go get more food and do it again.
- A person can run for hours, despite suffering from malnutrition.
- A person would work out for hours a day to keep up a body appearance that is clearly too thin.

Eating Disorders

Outsiders looking in tend to think one of three things about individuals who they think have an eating disorder:



There is just something wrong with their thinking!

or

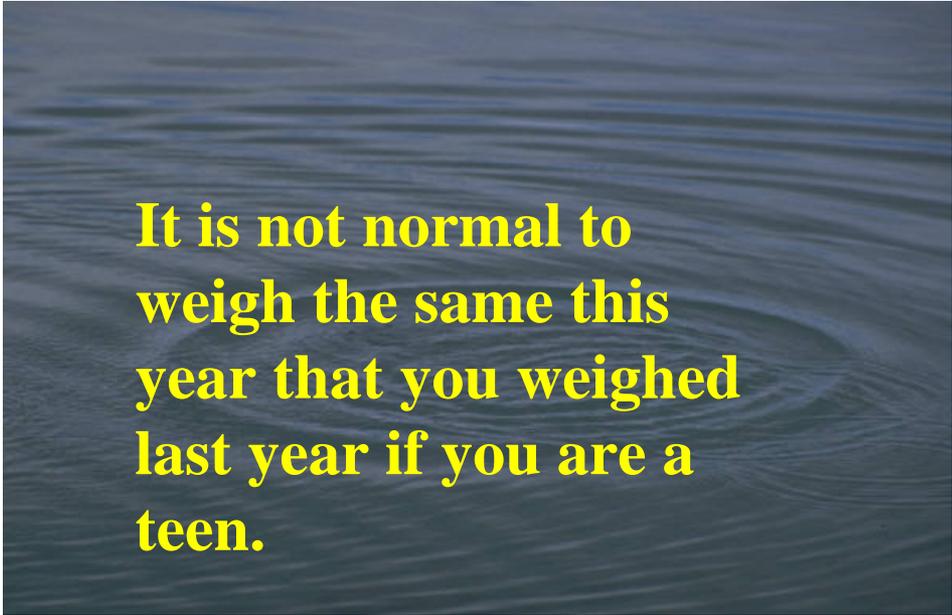
They just don't know any better, or they have a lack of knowledge!

or

They just need to grow up, or just stop it!

One is constantly growing during the teen years.

- The loss of expected weight gain during times of normal growth is actually weight loss.
- One should not maintain a constant weight during times of growth.



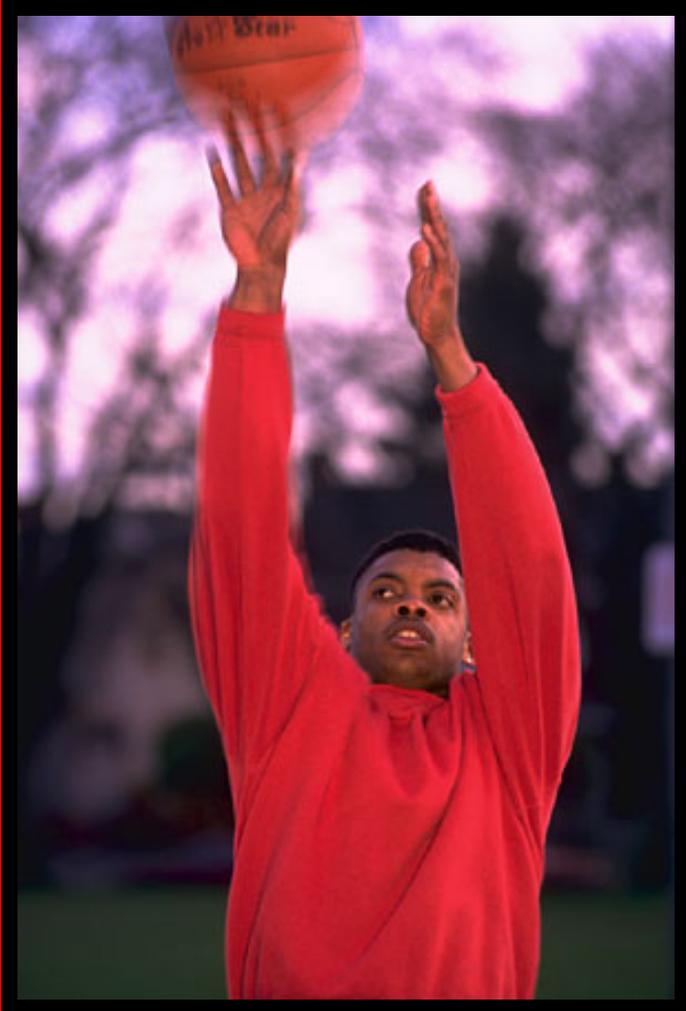
It is not normal to weigh the same this year that you weighed last year if you are a teen.

The average female weighs 144 pounds and is a size 12.

The average model weighs 23% less than the average woman.

**Barbie dolls are dolls;
people do not have
those kinds of bodies!**

National Youth Risk Behavior Survey



11,000 high school students were surveyed.

The results were:

27.5% of male and female students thought they weighed too much.

According to national statistics, about 30% of adolescents are obese!

National Youth Risk Behavior Survey



47.8% of the 11,000 reported they had attempted to lose weight in the *preceding month.*



National Youth Risk Behavior Survey



7.6% of females in the survey reported using **laxatives** or **vomiting** to lose weight, or to keep from gaining weight in the *preceding month*.

National Youth Risk Behavior Survey



Of these 11,000 kids, **76-85%** of females reported they **exercised** to lose weight, or to prevent weight gain in the *preceding month*.

Certainly not every dieting teen ends up with an eating disorder



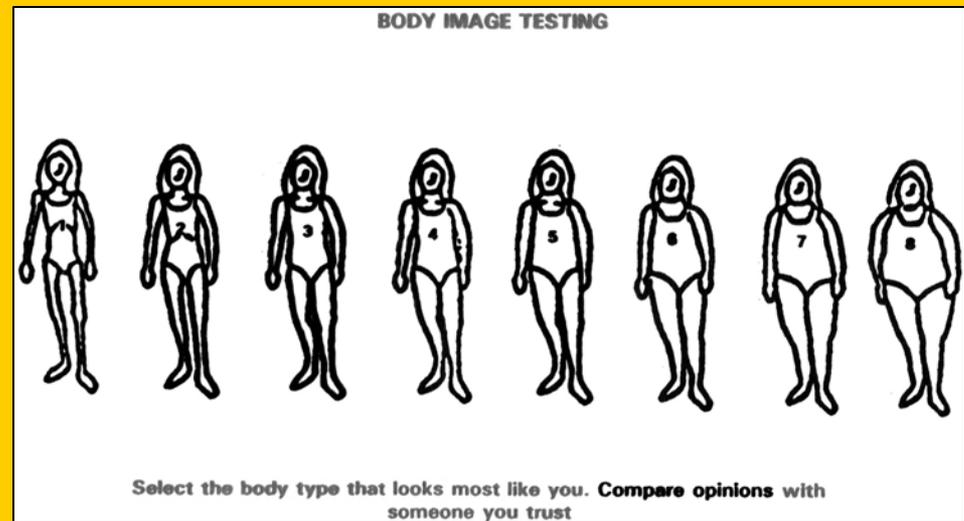
- But, almost all teens with eating disorders were *dieting at the time of the development of their eating disorder.*

- A eating disorder can start out as a “diet that gets out of hand.”
- Teens are particularly at risk.
- 86% of eating disorders appear before the age of 20.



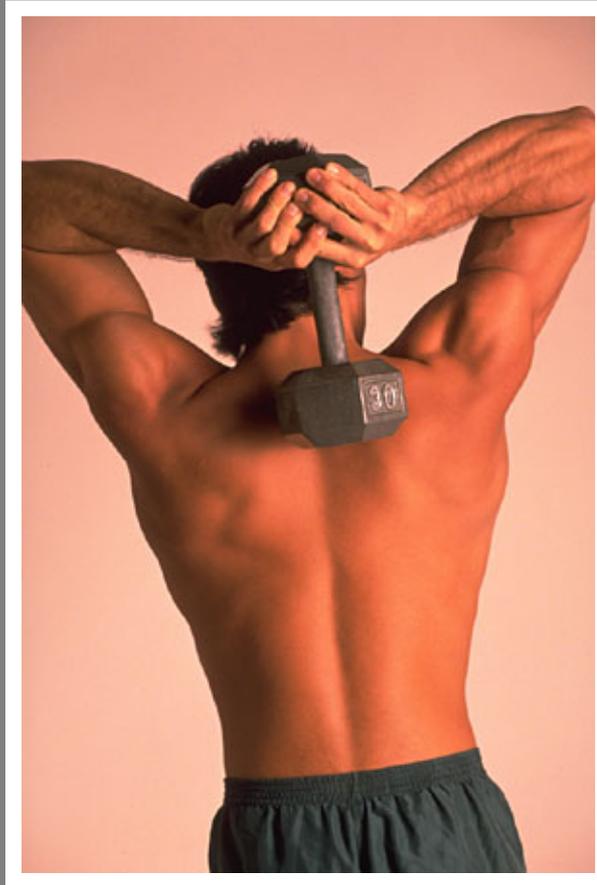
Dieting does not cause an eating disorder, but

- the constant attention regarding body weight, body shape, calorie and fat content in foods, can start a vicious cycle of not being satisfied with one's body. This can lead to an obsession about looks and a desperate means to control weight!!!



Interesting facts about guys and weight

When you ask guys to describe the perfect body, they tend to pick a body type about 30 pounds heavier than the normal weight. They like big and bulky.



When you ask girls to describe the perfect guy body, they pick lean and buff.

Dying to be thin!

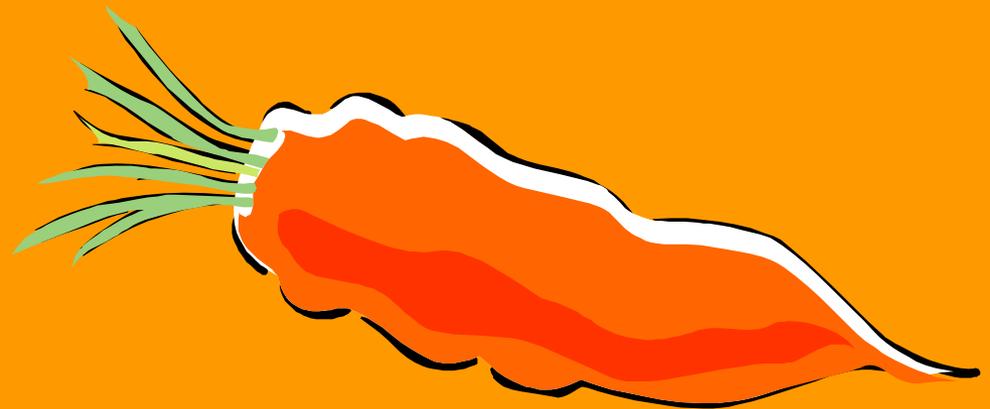


- *91% of college girls* diet “often” or “always”
- *40-60% of high school girls* are on diets
- *46% of 9-11 year olds (middle school)* are sometimes, or very often, on a diet
- *42% of 1-3rd grade girls* report wanting to be thinner



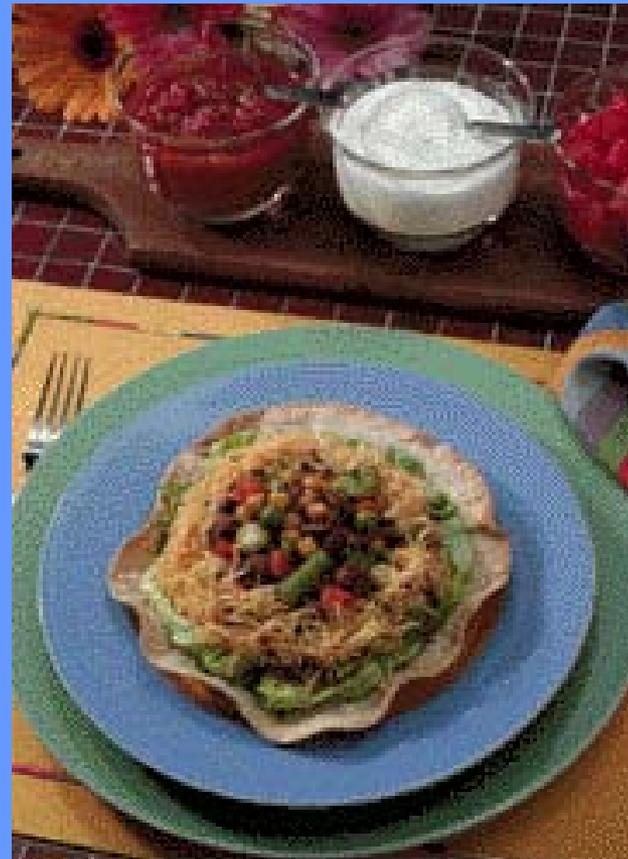
~Dieting~

- Rarely works
- 95% of all dieters regain their lost weight, plus more, within 1-5 years.



Calories- bottom line

- Less than 1,200 calories, one will feel hunger most of the time
- A diet of less than 1,200 calories a day cannot meet one's nutritional needs.
- A diet less than 1,200 calories a day will slow metabolism.

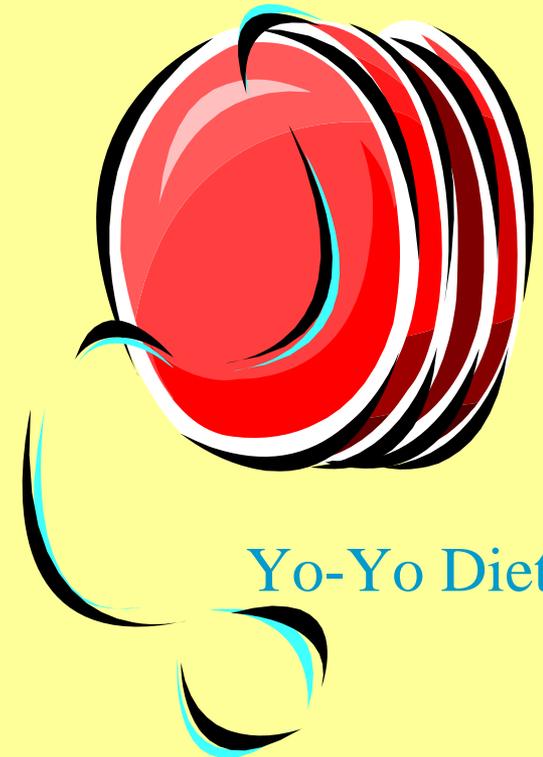


Dieting continued

It is better to be a little overweight actually, than to have your weight constantly fluctuating.

(weight off/weight on/weight off)

Also, according to a recent study, a slightly overweight active person is at less risk for health complications than a thin person who is not active. So being active is a key factor as well.





Dieting/the loss of periods/and Osteoporosis

Studies show that teens who do not eat adequately and lose as little as 10% of their body weight, can stop having periods.

The loss of periods resulting from weight loss can cause the bones to thin to the point of osteoporosis.

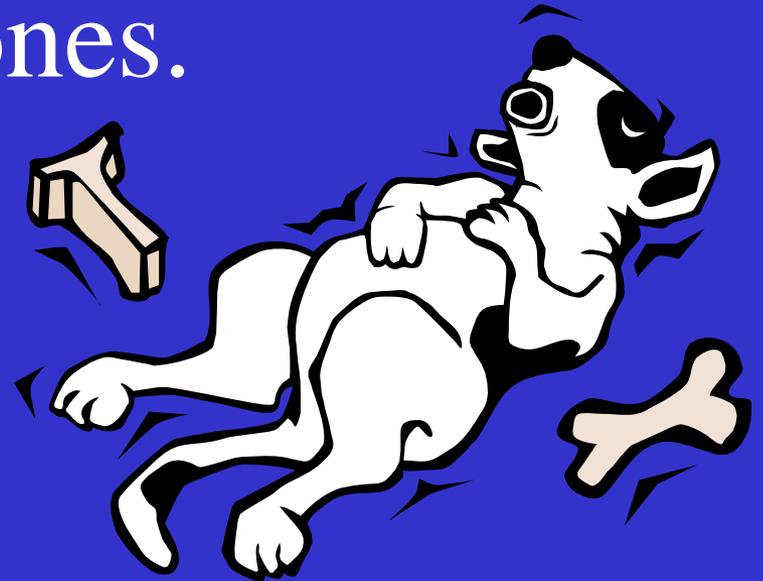
Osteoporosis in a teen can present with bones as thin as those of a 65 year old woman.



100 pounds – 10 pounds = 90 pounds

Once periods come back after weight is put back on, it is not a guarantee that the bones that have thinned to those of a 65 year old woman, will go back to teenage bones.

Brittle bones break easily!



What is ideal weight anyway?

The current criteria for determining the proper weight is

Body Mass Index

B M I



Table I. Body Mass Index (BMI) for selected heights and weights.

Wt. lbs.	Height (inches)																			
	56	57	58	59	60	61	62	63	64	65	66	67	68	69	70	71	72	73	74	75
70	16	15	15	14	14	13	13	12	12	12	11	11	11	10	10					
75	17	16	16	15	15	14	14	13	13	12	12	12	11	11	11	10				
80	18	17	17	16	16	15	15	14	14	13	13	13	12	12	11	11	11			
85	19	18	18	17	17	16	16	15	15	14	14	13	13	13	12	12	12	11		
90	20	19	19	18	18	17	17	16	15	15	14	14	14	13	13	13	12	12	12	
95	21	20	20	19	19	18	17	17	16	16	15	15	14	14	14	13	13	13	12	12
100	22	22	21	20	20	19	18	18	17	17	16	16	15	15	14	14	14	13	13	13
105	24	23	22	21	21	20	19	19	18	17	17	16	16	16	15	15	14	14	13	13
110	25	24	23	22	22	21	20	19	19	18	18	17	17	16	16	15	15	15	14	14
115	26	25	24	23	23	22	21	20	20	19	18	18	17	17	16	16	16	15	15	14
120	27	26	25	24	24	23	22	21	20	20	19	19	18	18	17	17	16	16	15	15
125	28	27	26	25	25	24	23	22	21	21	20	20	19	19	18	17	17	17	16	16
130	29	28	27	26	26	25	24	23	22	22	21	20	20	19	19	18	18	17	17	16
135	30	29	28	27	27	25	25	24	23	22	22	21	20	20	19	19	18	18	17	17
140	31	30	29	28	27	26	26	25	24	23	22	22	21	21	20	20	19	19	18	18
145	33	31	30	29	28	27	27	26	25	24	23	23	22	21	21	20	20	19	19	18
150	34	32	31	30	29	28	28	27	26	25	24	24	23	22	21	21	20	20	19	19
155	35	33	33	31	30	29	29	27	26	26	25	24	23	23	22	22	21	21	20	19
160	36	35	34	32	31	30	29	28	27	27	26	25	24	24	23	22	22	21	21	20
165	38	37	36	34	33	32	31	30	29	28	27	27	26	25	24	24	23	23	22	21
170	39	38	37	35	34	33	32	31	30	29	28	27	27	26	25	24	24	24	22	22
175	40	39	38	36	35	34	33	32	31	30	29	28	27	27	26	25	25	24	23	23
180	42	40	39	37	36	35	34	33	32	31	30	29	28	27	26	26	26	25	24	23

Interpretation of the BMI

- Interpretation after determining your body mass index



Underweight= < 18.5

Normal weight= $18.5-24.9$

Overweight= $25-29.9$

Obesity= BMI of 30 or or greater

The “Ideal” weight for someone with an eating disorder is always changing



- Most want to weigh less than 100 pounds
- But, if they reach their goal, they keep lowering and lowering the bar
- There is no weight low enough.

What behaviors constitute an eating disorder?



- **Anorexia:** self starvation
- **Bulimia:** Eating as much as possible and then trying to get rid of it somehow
- **Binge Eating Disorder**
Eating as much as possible, with no intention of getting rid of it. People who do this obviously are basically over-eaters.
- **Obesity:** Is not classified as an eating disorder, but it should be listed as one

Anorexia- means “ a nervous loss of appetite”



- Description: self starvation
- But, individuals with anorexia are actually very hungry and think about food all the time.
- They study diets and calories; they hoard, conceal, deliberately waste food, may collect recipes, and may actually cook for others and enjoy it.
- They talk about food a lot.

Anorexia - It's more than just being thin!

- Refusal to maintain adequate weight: less than 85% of ideal body weight
- Intense fear of weight gain
- Body-image distortion: feels fat even when obviously underweight
- Loss of periods for 3 cycles



What they
see in the
mirror is
not what
anyone
else sees.





Anorexia

Wear layers of of clothes to hide the thinness

Have a very low pulse

Have a very low blood pressure

May have a heart murmur

Seem to always be cold and have cold clammy skin as well

Temperature is abnormally low

The background of the slide is a dense, colorful field of M&M's candies in various colors including red, yellow, green, orange, and black. The candies are scattered and slightly out of focus, creating a vibrant, textured backdrop for the text.

Anorexia continued:

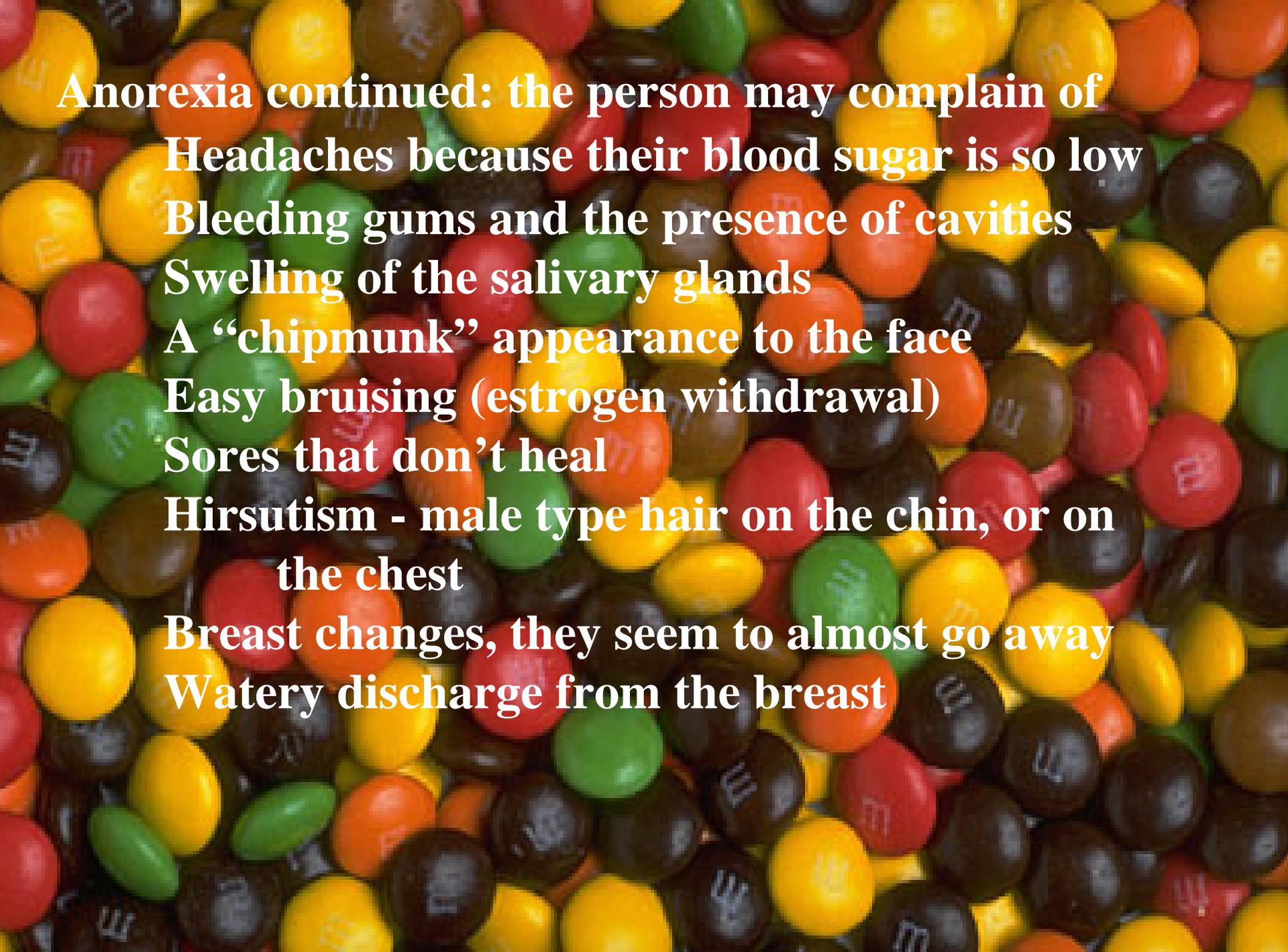
Pale dry flaky facial skin

Fine body hair around the border of the lips, lower jaw, and extremities (possibly for warmth)

Yellowish or bronze skin color

Mental status: difficulty thinking clearly

A health care professional can test one's urine and know if they have had something to eat in the last 4 hours or not

The background of the slide is a dense, close-up photograph of various M&M's candies in their signature colors: red, yellow, green, orange, and black. The candies are scattered across the entire frame, creating a vibrant and textured backdrop for the text.

Anorexia continued: the person may complain of
Headaches because their blood sugar is so low
Bleeding gums and the presence of cavities
Swelling of the salivary glands
A “chipmunk” appearance to the face
Easy bruising (estrogen withdrawal)
Sores that don’t heal
**Hirsutism - male type hair on the chin, or on
the chest**
Breast changes, they seem to almost go away
Watery discharge from the breast

They can restrict food enough to lose dramatic amounts of weight, but they cannot change the size of their hands, head, and feet.



The head, hands, and feet of a teen suffering with anorexia may appear too big for their bodies.



Healthy people have healthy hair

Other associated behaviors with anorexia

Self injury behavior

- 46.2% cutting
- 38.5% hitting
- 34.6% scratching

Primary areas

arms

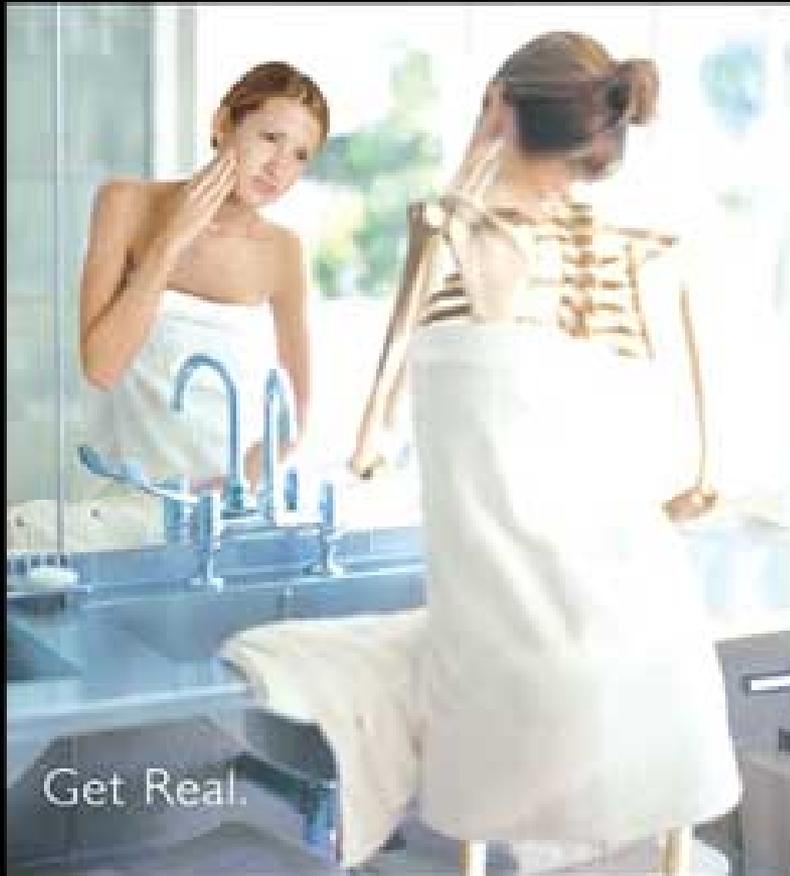
hands

face legs

genitals



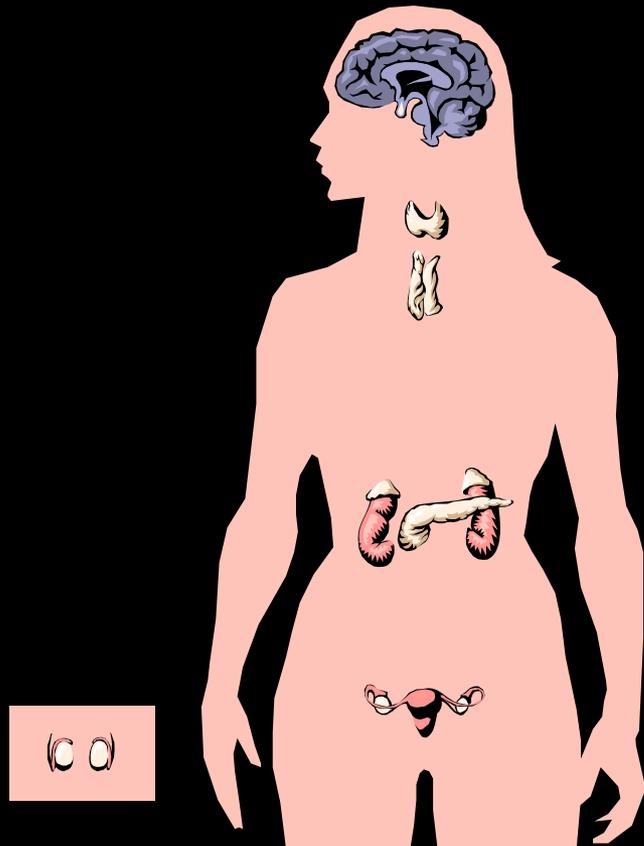
Problems associated with Anorexia



- Anemia
- Become dependent on laxatives
- Experience tooth pain and discoloration of the teeth (some wrap foil around their teeth to prevent this)
- Become forgetful (caused by deficiencies in nutrients that are essential to correct thinking)

More problems associated with Anorexia

- One's thyroid gland begins to be affected. One is always cold!
- Blood sugar goes drastically up and down
- Because of low blood sugar, one may complain of fatigue and feelings of anxiety, dizziness, and headache
- Problems with impulse control resulting extreme emotions (anger and rage)
- Not making good decisions- they complain that their "brain does not work right"



More problems associated with Anorexia



- Muscle spasms and pain. Muscles appear to be going away
- Swelling, pain, and tenderness of the salivary glands caused by vomiting
- Swelling and puffiness about the ankles and feet caused by an electrolyte imbalance
- Bloating of the stomach due to an electrolyte imbalance, as well as insufficient protein intake

Really serious problems associated with Anorexia



Anorexia nervosa as a 19th-century sideshow exhibit.

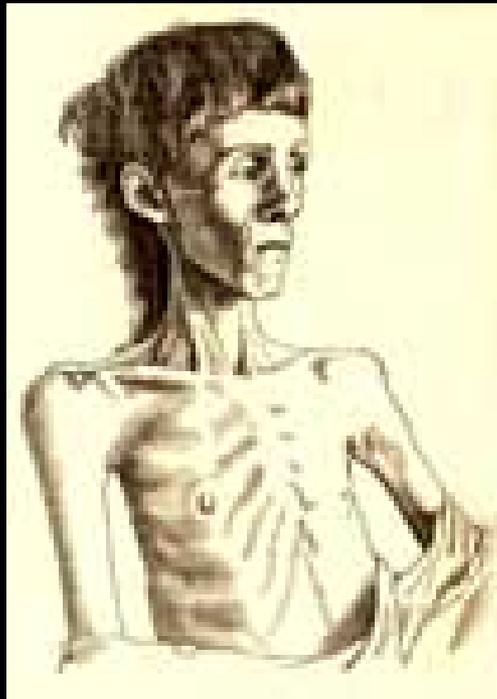
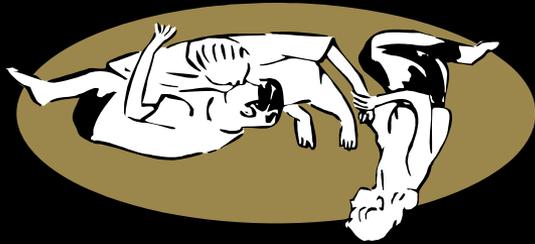
- **Renal** (if the body weight gets low enough, fifty pounds or so, the kidneys shut down)
- **Seizures** (not fully understood why)
- **Vision impairment** (especially night vision) may be due to a lack of vitamin A
- **Osteoporosis**-brittle bones that break easily

Loss of bone

In healthy volunteers who fasted for 4 days there was a 50% loss in bone formation.

In person underweight for more than 6 months - screen for osteoporosis.

Anorexia

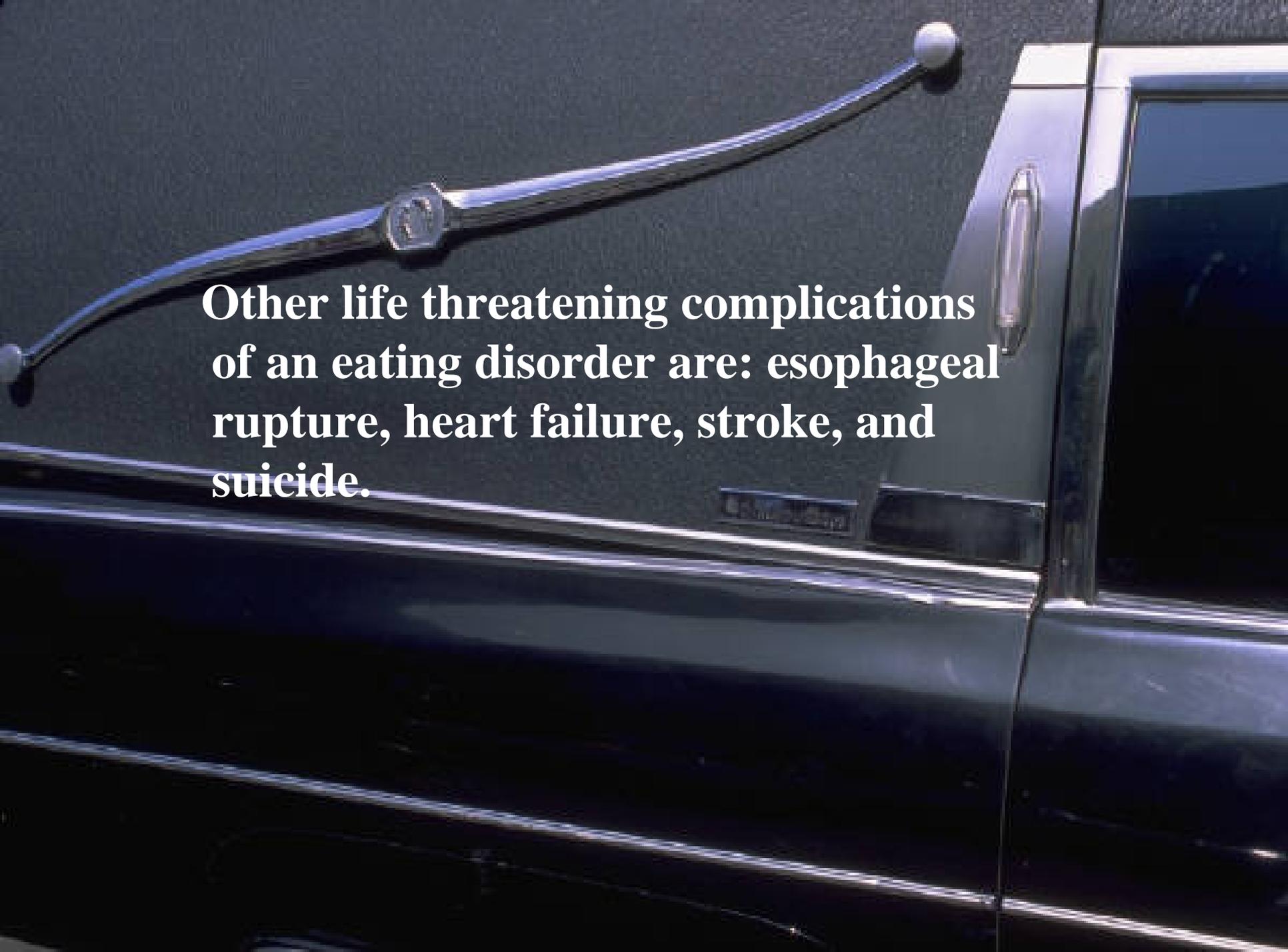


- 5-15% of teens with this disorder die from **cardiac arrest**; there is a decrease in cardiac muscle mass as well as chamber size.
- Low potassium leads to an **irregular heart rate**
- Forced vomiting **alters several electrolytes**: sodium, magnesium, calcium, and potassium

Anorexia

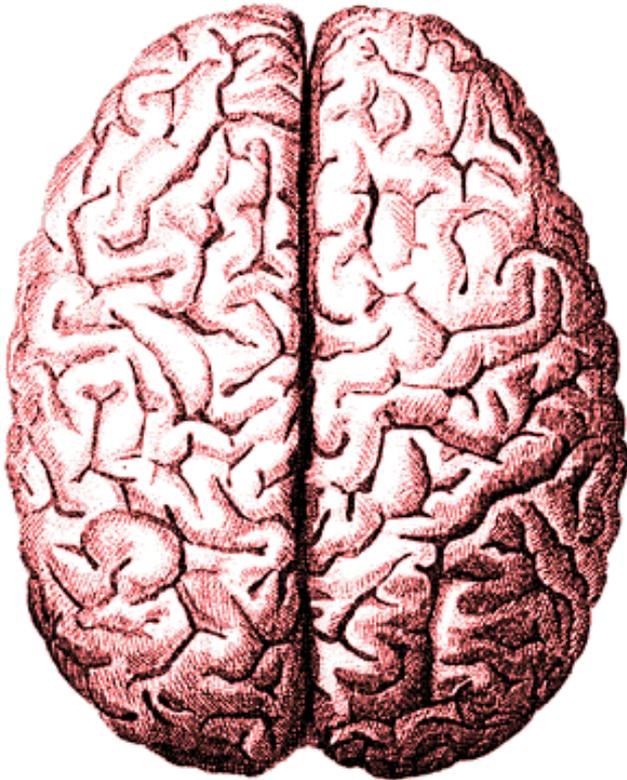


- Even on their death bed, people with anorexia can point to a place on their bodies where they feel they need to lose weight.
- Nocturnal cardiac arrest (low potassium)

A close-up photograph of a classic car's door handle and trim. The handle is a polished chrome rod with a circular push-button in the center and spherical end caps. The background shows the car's body panels, including the door and a window frame, all finished in a highly reflective chrome. The lighting creates bright highlights and deep shadows, emphasizing the metallic texture.

Other life threatening complications of an eating disorder are: esophageal rupture, heart failure, stroke, and suicide.

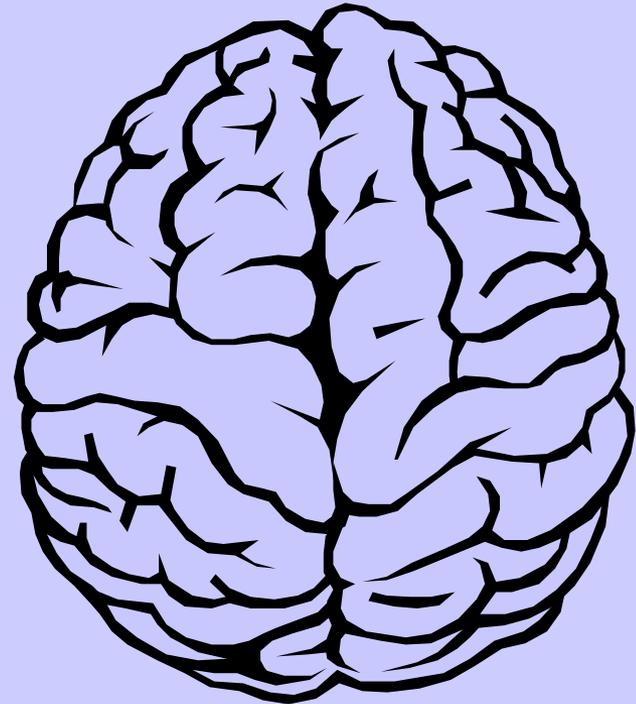
Cognitive distortions



We know the act of starvation cause abnormalities in the way the brain sends messages through it.

Brain differences

- One study did brain imaging before and after individuals with eating disorders imagined food and compared it to those without an eating disorder.
- They found there were differences from those who did and did not have a eating disorder, as well as a difference between the different types of eating disorders.
- What does this mean?



Patients with eating disorders typically state they think their brain is different than others.



- Infection,
Autoimmune disease,
Thyroid disease,
Diabetes,
Cancers,
Certain medications

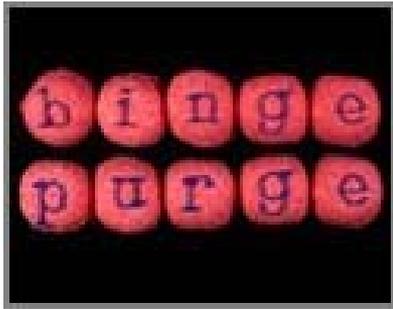
There are other
causes of
weight loss.



There are several ways to “skin a cat” or several ways to control weight.

- Starve yourself
- Eat it and then lose it by vomiting, taking laxatives, or diuretics (water pills)
- Use exercise to control weight





Bulimia- eating with the intent to get rid of the calories consumed



- Binge eating-eating a large amount of food
- Purging-vomiting, laxatives, diuretics, and/or excessive exercise to prevent weight gain
- Preoccupation with body, size and shape
- Body shape/weight is way too important

1-4% of the females in the U.S. reported to have bulimia

Bulimarexic- sort of both



30-50% of those with an eating disorder have both

- An older term not used much anymore; it is possible to have more than one approach to losing weight
- Shares behaviors of both anorexia and bulimia
- “I’m not an anorexic because I eat, and I’m not a bulimic because I often don’t eat.”

Broken down by age



- Anorexia- one in every two hundred girls between the ages of 12 and 20 suffers from this disorder
- Bulimia- Up to 10 girls in every two hundred between the ages of 12 and 20 develop this disorder; therefore, it is more common.
- Bulimia sometimes develops after “failed anorexia”
- More common to start out as anorexia right as one enters puberty, and again about the time one leaves home
- Then in later teen years, to go to bulimia

Someone with Bulimia may be thin, or they may be normal weight, or they could appear a little over-weight.

Bulimia- interesting notes

- Bulimics, although concerned about becoming obese, tend to stay within 10-15 pounds of their normal weight
- Sometimes it is a lot of food, sometimes it is just a normal amount
- They have to binge at least twice a week to be diagnosed as having bulimia



Bulimia- more interesting notes



- Vomiting and purging lowers a person's potassium levels and can cause an abnormal heart rhythm.
- Individuals with Bulimia tend to feel worse about what they are doing than those who choose anorexia as a way to control weight.

Bulimia- more interesting notes



- The most common cause of death is suicide.



Bulimia:



Physical findings will relate to excessive vomiting, bingeing, or abuse of laxatives. Look at teeth, tongue, and knuckles.



Dangerous methods to purge



- Ex-Lax and Correctol are the more popular laxatives used by teens with an eating disorder.
- They don't actually work because by the time they work, the calories have already been absorbed.
- It is only water loss that makes it seem like one weighs less.

Laxative use



- The feeling of weight loss is only temporary because the body will start to retain the water they lost with the laxative within 48-72 hours.
- Laxative use can actually lead to constipation.
- Electrolyte imbalance and dehydration can lead to death.
- Often the extent of laxative abuse reveals the severity of the teen's illness.

Laxative use



- The repeated use of laxatives can cause a “cathartic colon” which is a colon that loses its ability to function normally without the use of large doses of laxatives.
- The cause is the destruction of the nerves in the colon that control elimination.
- Laxatives are habit forming!

Laxative use



- Reports of laxative abuse among high school students ranges from 3.5-7%.
- 40% of these students use laxatives at least several times a week.
- Weight loss is only water loss!
- Liquid stools can cause the rectum to prolapse.
- A cathartic colon is a large dilated colon that cannot function.

IPECAC



- Is used in the ER to induce vomiting
- Is extremely dangerous when used and abused
- Can destroy the gag reflex making it no longer possible to self induce vomiting
- This substance destroys muscles including the heart muscle

Water pills



- Same as laxatives, the person only loses fluids and electrolytes
- As soon as the body replaces those fluids, the person repeats the use.
- Cardiac arrest and heart failure are a possible consequence.

- Acutrim and Dexatrim are more commonly used.
- One's vital signs are linked to the central nervous system.
- Once pulmonary disease develops from diet pills, life expectancy is typically three years (Fen-Phen).
- Ephedrine containing pills are the most dangerous.

Diet pills



Bulimia-Medical complications



- Stomach rupture
- Heart failure
- Loss of periods
- Addictions and/or compulsive behavior
- Clinical depression, anxiety, obsessive-compulsive disorder, and other psychiatric illnesses
- Increased risk for suicide

Bulimia-Medical complications

- You want to find it early, not at age 30-50
- Bulimia and the malnutrition that results can adversely affect nearly every organ in the body.



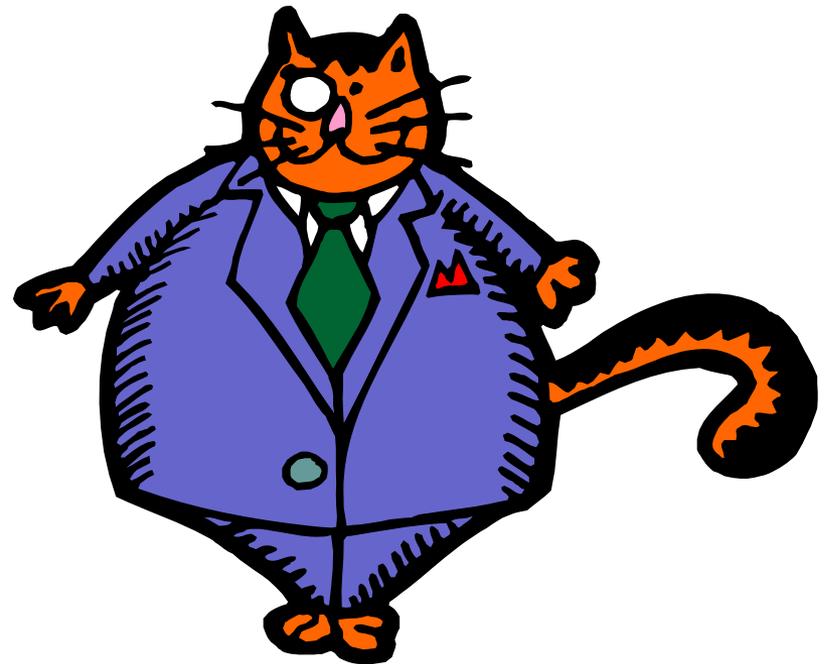


Added dangers of having an eating disorder

Binge Eating Disorder

This is basically out of control eating.

It resembles bulimia as with the uncontrolled eating and binging, BUT it differs from bulimia because sufferers do not purge their bodies of the excess food by vomiting, laxative abuse, or diuretic use.





Binge eating disorder- diagnostic criteria

- Binge eating with lack of control
- Occurs twice weekly for 6 months
- Marked distress regarding bingeing
- No purging
- Eating more rapidly than normal
- Eating until uncomfortably full
- Eating large amounts while not physically hungry
- Eating alone because embarrassed about the amount one is eating
- Feeling disgusted with oneself, depressed or guilty after eating.

It's more than just eating a lot of food.

Obesity versus Binge eating disorder:

Binge eating disorders cause distress for the one who is binge eating. Binge eating is associated with mood states, and has triggers.

Binge eating also involves an altered state, of being “numb” or “spaced out”

Obese individuals do not necessarily engage in the binge eating behaviors. Obese patients tend to over-eat throughout the day.

There is relief from tension and anxiety by eating.



We lose weight in this order:

Water Loss

Fat loss

then

Lean muscle loss

**The loss of muscle tissue is
serious and dangerous!**

Why do some teens have an eating disorder and others do not?



- Society and the mental image of the perfect body don't help!!
- Eating disorders are self-destructive.
- Most often used to cope with painful emotional or psychological problems

Periods and eating disorders

- One can stop having periods sometimes even before losing much weight.
- One can stop having periods with the loss of only 10-15% of one's body weight.
- Periods can stop for two reasons; the loss of body fat to below 22 or 23 percent, or just because of the stress of the disease.
- Bulimics tend to have irregular periods, where as anorexics often skip or stop periods.
- Breast tissue disappears as well



Eating disorders and sexual abuse



- Sometimes eating disorders are associated with sexual abuse.
- Anorexics who have been traumatized sexually, often want to look unfeminine.
- Bulimics crave attention and are seeking to look better and they think thinner is better.

Interesting notes on eating disorders



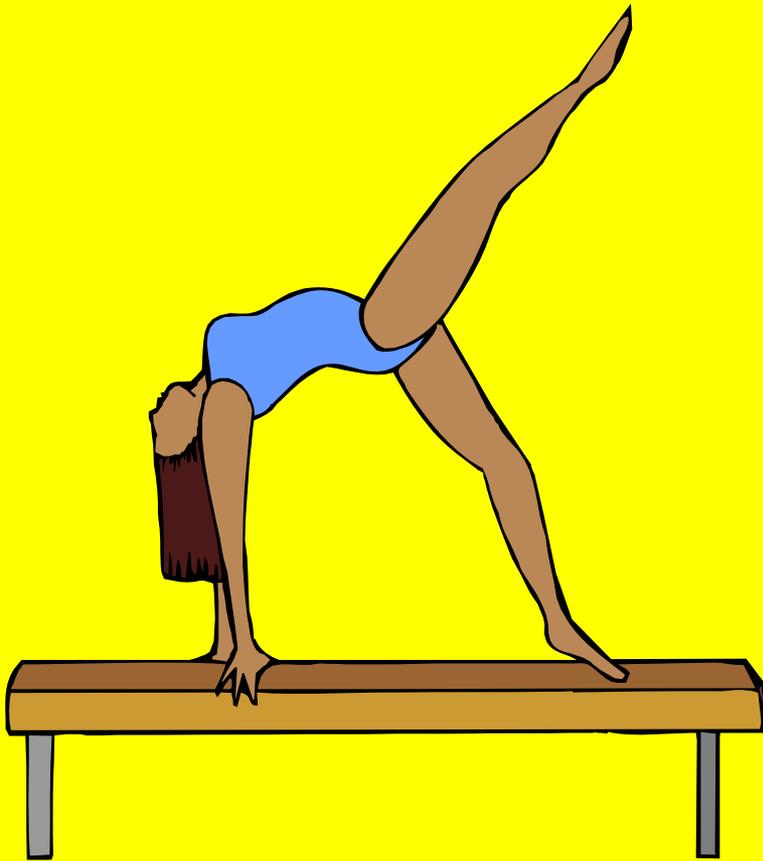
- Many rituals are associated with eating disorders, from the time and/or place food is eaten, to the way it is consumed.
- For example, may smell each bite before it is consumed or,
- May not allow the food to touch the sides of the mouth.
- Sometimes no food is allowed after a certain time of the day.
- May limit foods to just two or three items: such as carrots, bran muffins, strawberries, or popcorn.
- 24% of individuals with eating disorders steal compulsively (it may be the laxatives or the food).

Interesting comparison of guys vs girls regarding eating disorders

- Guys tend to develop eating disorders later than girls (age 21 vs age 17)
- As many as *one in five* male college students worry about their weight and body shape, follow rules about what they can and cannot eat, and limit food intake.



Eating disorders in athletes



- 62% of female athletes have some form of an eating disorder, from being finicky, to the other end of the spectrum.
- Varies from sport to sport (swimmers at 15% to gymnasts at 62%)

The Female Athlete Triad

- Eating disorder
- Amenorrhea (loss of periods)
- Osteoporosis (dangerously thin bones)



The Female Triad

- It requires approximately 17% body fat for periods to start.
- It requires approximately 22% body fat to continue to have periods.
- The female body is programmed to turn off its reproductive capacity in the face of extreme stress such as a severe self-induced catabolic state.
- The athlete has 10 times the risk for a fracture

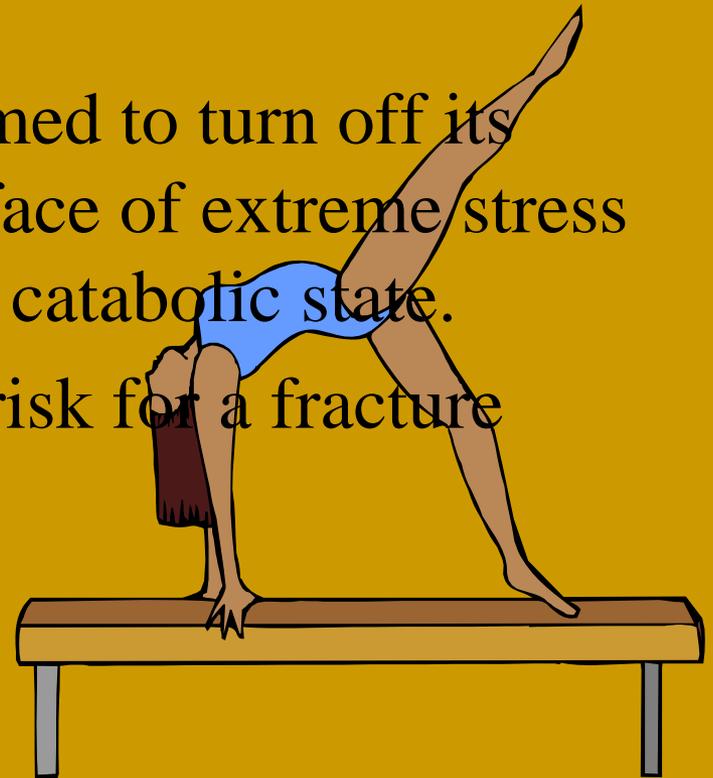


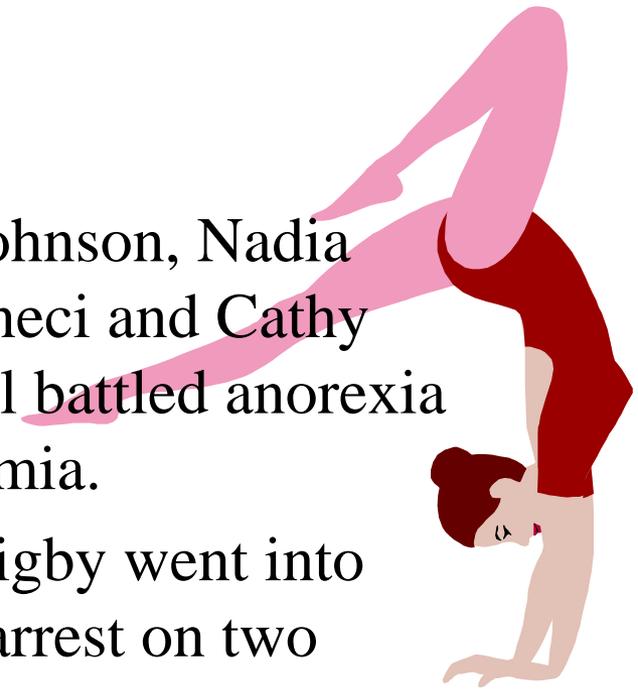
TABLE 1

Athletes and age of menarche

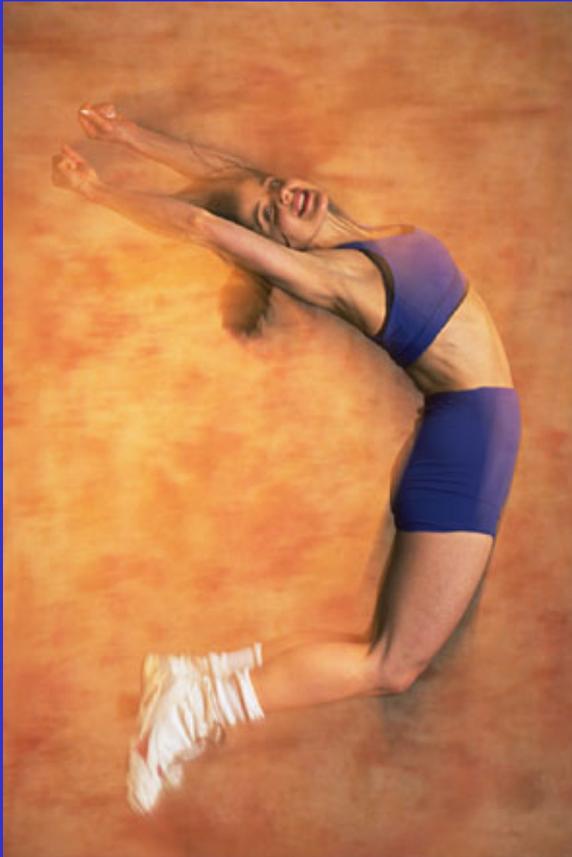
Sport	Study	Number of patients	Mean age of menarche
Gymnastics	Claessens et al. ³	201	15.6
Figure skating	Marker ⁴	30	15.0
Ballet	Warren et al. ⁵	75	14.5
Running	Frisch et al. ⁶	17	13.8
Rowing	Malina et al. ⁷	59	13.7
Swimming	Marker ⁴	52	13.1
Volleyball	Marker ⁴	63	13.1
Handball	Marker ⁴	98	13.0
Control subjects in US	Zacharias et al. ⁸	63	12.8

Athletes are actually at higher risk of sudden death

- Kathy Johnson, Nadia Commaneci and Cathy Rigby all battled anorexia and bulimia.
- Cathy Rigby went into cardiac arrest on two occasions.
- In 1976 the average gymnast was 5'3" weighing 105 pounds.
- In 1992 the average gymnast was 4'9" weighing 88 pounds.



It's never normal to stop having periods because one is so active!!!



- Ballet dancers
- Runners
- Others

New term - “instrumental vomiting”

Term used to describe individuals who vomit as a way of controlling weight for athletic competition



Ever heard of college binge/purge parties?

- Is exactly what the name implies
- All the forbidden foods at these parties



It's not just a teen problem!

- More and more eating disorders are being diagnosed in women in their twenties, thirties, forties, and beyond.



Late-onset anorexia

- Some women after divorce think they have to be thin to find another man.
- May blame their looks as the reason for losing their husbands
- Some develop eating disorders after the children leave, to try to fill the void.

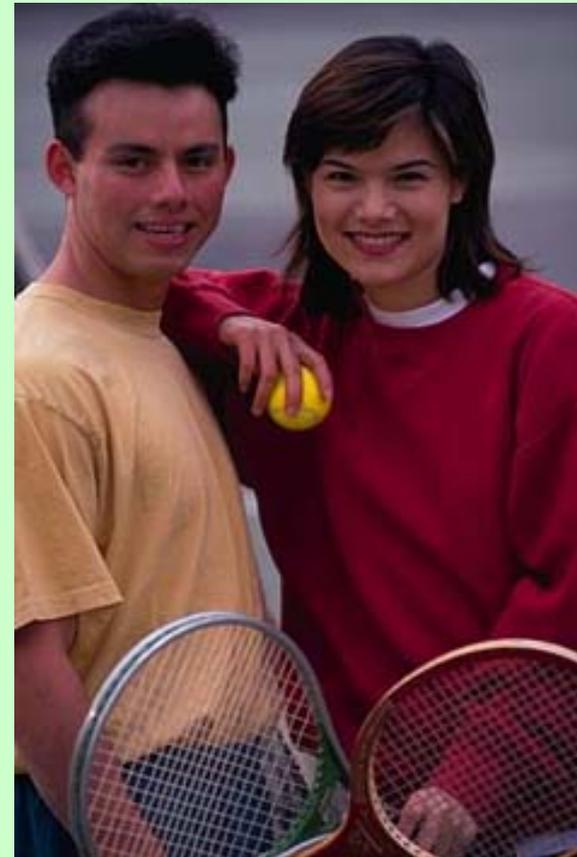


- 
- A close-up photograph of a classic car's exterior, focusing on the chrome trim and door handle. The car is dark-colored, and the chrome elements are highly reflective. The door handle is a vertical, oval-shaped chrome piece. The background is a dark, textured surface.
- *Eating disorders take the lives of 1000 individuals per year!*

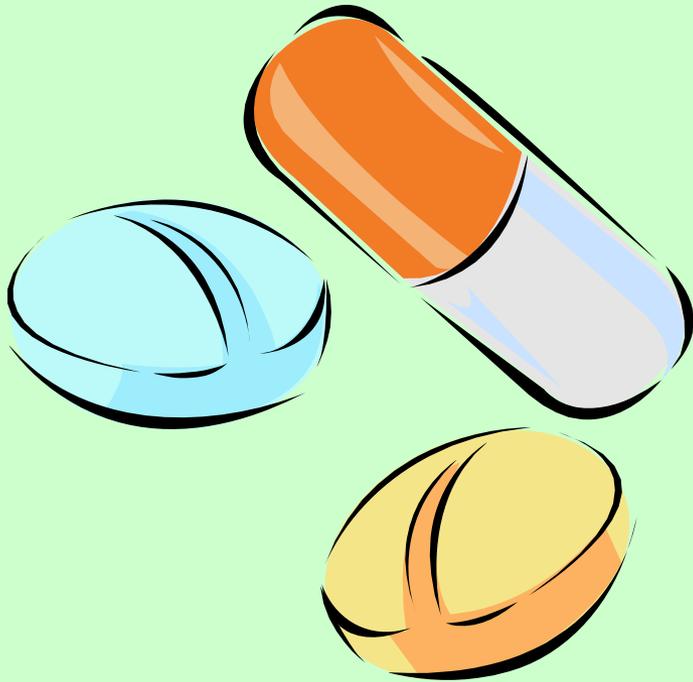
There is hope, and there is treatment

The earlier the treatment
begins, the better

Treatment includes **medical
monitoring, nutritional
counseling,
psychotherapy,
medication, and
sometimes
hospitalization.**



Treatment



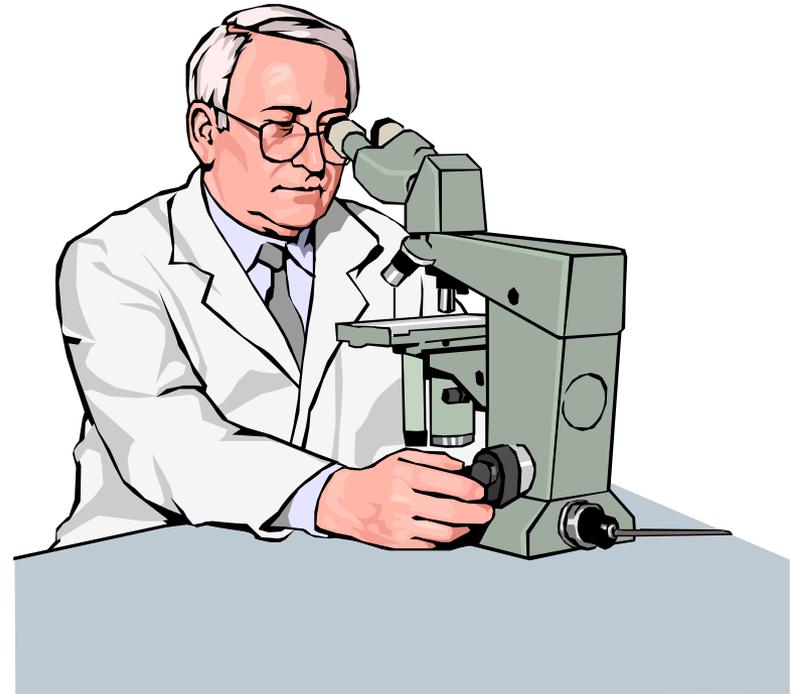
- **Bulimia and Binge Eating Disorders** are typically treated with antidepressants.
- **Anorexia** is treated with hospitalization and medication.

The “75% to 90%” rule in treatment

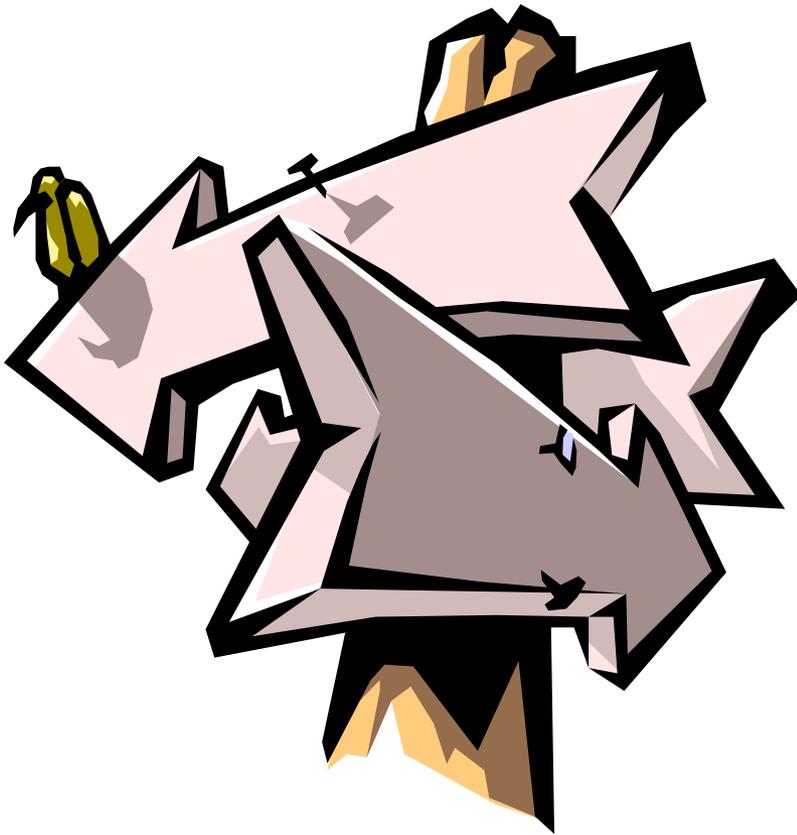
One must eat at least 75% or 90% of all items of all meals of all days but one must leave 25%- 10% of all items of all meals of all days.

Genetics

- Twins have a greater chance of development
- No specific gene yet found with direct link



What to Learn from This!



- If you are thinking about doing these behaviors- think again!
- It is a life and death choice!
- Sometimes the harm to your body cannot be undone!

The END

