ADOLESCENCE

The most dramatic changes in physical development that occur during adolescence are those related to puberty. Puberty refers to the time when the body reaches reproductive maturity. The reproductive organs mature and secondary sex characteristics appear. This process usually begins between the ages of 8 and 14 and may last several years.

The physical changes that take place are triggered by the release of hormones. The hormones estrogen and progesterone trigger puberty in females. Testosterone triggers the onset of puberty in males.

Puberty changes in females:

- Growth spurt: Females generally experience a growth spurt between the ages
 of 10 and 13, about two years earlier than the male growth spurt. The growth of
 the trunk is delayed by one year in comparison to the arms and legs. This
 makes the limbs appear awkward.
- 2. Development of breasts: This development occurs slowly and may continue for several years. The development of the breasts may cause the adolescent to feel self-conscious, especially if one breast develops faster than the other (this occurs frequently).
- 3. Pubic hair: The pubic hair begins to grow at about the same time the growth spurt occurs.
- 4. Underarm and coarser body hair: This generally appears two years after pubic hair.
- 5. Menstruation: The beginning of menstruation is called menarche. The first menstrual period usually occurs two years after breast development begins. First cycles may be irregular, but females may become pregnant any time just prior to or following the first menstrual period.

Puberty changes in males:

- 1. Growth of reproductive organs: Enlargement of the penis, testes, and scrotum occurs. Sperm production begins at this time and will generally continue throughout life.
- 2. Growth spurt: Arms, legs, and penis grow. A male typically experiences 3-5 inches of growth in height within a year's time. As with females, growth of the trunk is delayed about one year in comparison to the arms and legs. This causes the limbs to appear lanky and awkward. The voice begins to deepen as a result of internal growth of the larynx (voice box). This may be a very difficult time for boys who experience their growth spurt later than others.
- 3. Pubic hair: Long strands of straight pubic hair appear at the base of the penis, then spread over the scrotum and up the abdomen. Eventually, this hair will become more coarse.
- 4. First ejaculation: This occurs about one year after puberty begins. This indicates that a boy is producing sperm and he is capable of reproduction.
- 5. Underarm and coarser body hair. This usually occurs two years after pubic hair.
- 6. Facial hair and voice. The beard develops and the voice deepens.

TEACHER INFORMATION

EMOTIONAL DEVELOPMENT

The hormones that cause the physical development to occur also produce emotional changes. Most adolescents feel emotions much more intensely than before. The happiness that they feel is more intense, and the sadness they feel is more intense. The changing level of hormones produces emotional swings. One day an adolescent may feel intensely happy, excited and really enjoy life. The next day the same adolescent may feel intensely sad, depressed, and hate life. For this reason, the suicide rate is higher among adolescents than among adults. If adolescents wait a short period of time, the mood swings back to a happier level. Fortunately, the level of hormones comes into balance as the adolescent reaches adulthood. Emotions are stabilized, and radical mood swings are eliminated.

Many adolescents experience other emotional difficulties in conjunction with these mood swings. They may feel clumsy or awkward as their bodies grow and change so rapidly. They may feel embarrassed about the development of genitals and breasts. This is especially difficult for the male who develops later and for the female who develops earlier. Acne or body odor also may cause embarrassment. Adolescents may experience conflict within themselves because they want to be an adult but are not ready or perhaps willing to take on adult responsibilities. They may experience conflict with adults if they feel that the adults do not treat them as adults.

While adolescents are sexually mature when puberty ends, they are rarely, if ever, emotionally or socially mature as long as they are adolescents. They need time to grow and understand their feelings. They need to learn that they are responsible for themselves and their relationships with others.

SOCIAL DEVELOPMENT

Adolescence marks a significant change in how individuals deal with their family and friends. Family becomes less important as they gradually begin their quest for independence. Conversely, friends become more important in the life of the adolescent. By early adolescence, they are drawn to a peer group. The peer group becomes an important influence on their decisions and attitudes about life. The adolescent, seeking to understand his/her identity, begins to identify with the peer group and to satisfy the need of feeling love and belonging by becoming an integral part of the group.

Social changes in the life of the adolescents are also influenced by parents, teachers, and other adults in their life who begin to have higher expectations from them. The adolescent is expected to take on more responsibility at home and to become more responsible for his/her own learning at school. The adolescent must learn to manage and balance his/her obligations as an important part of growing up.

TEACHER INFORMATION

INTELLECTUAL DEVELOPMENT

Adolescents begin to think in more abstract terms, to reason and to think symbolically. They begin to understand theories and then can test them. Symbols can be used and understood in place of real objects. They begin to test new ideas and to think things through for themselves. The decision-making skills are much improved because they are able to imagine the consequences of actions and think of alternatives to their actions. Most importantly, they are developing the ability to reflect on the results of their decisions and to learn from their mistakes. Thus, learning decision-making skills is one of the most important aspects of a teenager's intellectual development.

According to Erik Erikson, the early adolescent is in search of identity versus role confusion. Adolescents frequently ask themselves, "Who am I? What am I doing here? What is my place in life?"

Because of this drive to obtain identity, adolescents find comfort in similarities with peers. Conformity to fashion styles and to ideas is tremendously important to them. They form "cliques," ostracizing others who are "different" or do not conform. This is a negative means of developing their own identity. If teens get pregnant, they become so involved in the life of their child that they may lose their own identity. In later years, this loss of identity results in confusion as they try to discover who they really are.

Adolescents talk for hours either on the phone or in person. Their conversations are generally a verbal examination of how others who are important to them think, feel, and act. This is simply another means of defining their own identify. Parents need to understand the struggles taking place inside the adolescent and understand the slow, but steady quest for independence.

The later level of adolescence, according to Eric Erikson is intimacy versus isolation. An adolescent who has successfully solved his/her quest for identity will find the search of intimacy to be much easier than someone who is still searching for his/her identity. This is because a good sense of personal worth is of great importance in this new and powerful interest in a special person of the opposite sex--the drive for intimacy.

Intimacy is far more than just an interest in another person's body although that is definitely present. It is a gaining of strength of self in relation to others. It is a sharing of thought, place, and things with a special person. It is the development of a new ability to become very close to another, to be able to share everything with this special person.

This is vital training for the future when they may become parents and must enlarge this intimacy to include each child in their family. Experts have found that many problems experienced by parents may be traced back to their inability to satisfy this drive for intimacy in their late teens.

TEACHER INFORMATION

Failure to solve this intimacy challenge leads to isolation and despair and to a sense of worthlessness. This may be the prime cause of youth suicide, alcoholism, drug abuse, rebellion, and violence.

The drives of adolescents can lead several directions. Teens can be very altruistic-feeling a strong urge to contribute to humanity. On the other hand, these drives can also lead to a rejection of ideals their parents cherish, resulting in runaways, joining cults, and engaging in movements and rebellions.

Rebellion generally arises from a feeling of not belonging or rejection. If teens do not feel good about themselves, they are driven to experiment with lifestyles--to try other ways of achieving identity and intimacy.

Parents need to understand and be sympathetic with these adolescent drives, to work with them, not against them. They need to use more praise than criticism. They need to treat the adolescent with the same respect they expect for themselves and that they give to their friends.

If parents have developed good communication patterns with their children over the years, then they will more likely be able to work out compromises and settle differences peacefully. However, parents will still feel frustrations. It may be difficult for parents to see their children view others with more significance and appreciation when the other people have not invested nearly as much time, love, and worry on the child as they have.

Setting limits is very important with adolescents. As with any other age group, limits help children feel more secure. However, adolescents will frequently rebel against limits that are imposed, no matter how appropriate those limits may be. Parents need to evaluate the boundaries set for their adolescent children and be certain that they are appropriate for his/her age group. Remember, the adolescent is moving quickly into adulthood and will need more independence and freedom.