anovulatory cycles, miscarriage rates, and maternal and fetal complications in pregnancy. Obesity in men is associated with abnormal sperm parameters. Preconception counseling regarding smoking cessation is important as there is evidence to suggest that smoking cessation can reverse the detrimental impact of smoking on fecundity. Smoking decreases fertility rates by a direct impact on oocyte DNA and also increases the risk of miscarriage and ectopic pregnancy. In addition, smoking during pregnancy is associated with an increased risk of placental abruption and intrauterine growth restriction (IUGR). Moreover, the impact of smoking on ovarian reserve has been shown to accelerate the time to menopause by 1–4 years. As high levels of caffeine consumption increase the risk of infertility and miscarriage rates, women should be counseled to restrict caffeine consumption to ≤2 cups while attempting pregnancy and during pregnancy. Use of testosterone products, which are widely used for the treatment of hypoandrogenism and sexual dysfunction in men, should be stopped. Inquiries should be made about possible misuse of androgens for physical appearance or performance enhancement **(Chap. 399)**. As part of the preconception counseling, patients should be informed that the fertile window is typically 5–6 days prior to ovulation, and therefore, intercourse every 1–2 days during this time period will increase the chance of pregnancy. Various methods are used by women to detect ovulation, including basal body temperature measurements, assessment of changes in cervical mucus, and urinary LH kits. A rise in basal body temperatures indicates that ovulation has occurred and therefore cannot be used to time intercourse. LH kits can be used to detect the start of ovulation and subsequently time intercourse on the day of the LH surge and the following day.

**Treatment** Treatment recommendations depend on the results of the fertility evaluation described above **(Table 396-1)**. The success of different treatments depends on several factors including age of the female partner, assessment of ovarian reserve, history of smoking, BMI, and race.

## TABLE 396-1 Assisted Reproductive Technologies