Committee on Immunization Practices recommends for use in children older than 10 years old and at increased risk for exposure (Folaranmi T, Rubin L, Martin SW, et al, 2015).

## **Recommendations for Selected Immunizations**

Two additional vaccines are recommended for children and adolescents at high risk for particular diseases. Two rotavirus vaccines, RotaTeq (RV5) and Rotarix (RV1), have received a license from the US Food and Drug Administration for distribution in the United States. Rotavirus is one of the leading causes of severe diarrhea in infants and young children. RotaTeq is licensed for administration to infants at 6 to 12 weeks of age, with two additional doses administered at 4- to 10-week intervals but not after 32 weeks old; the dose is 2 ml, and the product must be protected from light until administration (American Academy of Pediatrics, 2015). Rotarix (1 ml) may be administered beginning at 6 weeks of age, with a second dose at least 4 weeks after the first dose but before 24 weeks old. Both vaccines are administered orally.

Three human papillomavirus (HPV) vaccines have been licensed for use in adolescents; a nine-valent HPV (9vHPV or HPV9) vaccine was approved by the US Food and Drug Administration in December 2014, making three vaccines available (2vHPV, 4vHPV, and 9vHPV) for female children and adolescents to prevent HPVrelated cervical cancer. The vaccine is administered intramuscularly in three separate doses; the first dose in the series may be given at 11 to 12 years old (minimum age, 9 years old), and the second dose is administered 2 months after the first, with the third dose being given 6 months after the first dose. The HPV4 or HPV9 vaccine may also be administered to boys and men 9 to 26 years old in a threedose series to reduce the likelihood of genital warts (Petrosky, Bocchini, Hariri, et al, 2015; American Academy of Pediatrics, 2015). The bivalent vaccine (HPV2), Cervarix, is licensed for use in girls and women 10 to 25 years old for the prevention of HPV-related cervical cancer; this vaccine is given in a three-dose series.

Immunizations that may be used in older children and adolescents in the future and that are being evaluated include vaccines for preventing diseases, such as herpes simplex virus (HSV), human cytomegalovirus, and Epstein-Barr virus.