

U.S. National Library of Medicine National Center for Biotechnology Information **NLM Citation:** Drugs and Lactation Database (LactMed) [Internet]. Bethesda (MD): National Library of Medicine (US); 2006-. Hepatitis B Immune Globulin (Human). [Updated 2020 Feb 17]. **Bookshelf URL:** https://www.ncbi.nlm.nih.gov/books/



Hepatitis B Immune Globulin (Human)

Revised: February 17, 2020.

CASRN: 373609-41-7

Drug Levels and Effects

Summary of Use during Lactation

Hepatitis B immune globulin is an immune globulin (IgG) rich in IgG antibodies against hepatis B. IgG is a normal component of breastmilk. No special precautions are required during breastfeeding. Hepatitis B immune globulin is recommended along with hepatitis B vaccine to be given to infants of mothers who are positive for hepatitis B surface antigen. No differences exist in infection rates between breast-fed and formula-fed infants born to hepatitis B-infected women, as long as the infant receives these preventative measures at birth. Mothers with hepatitis B are encouraged to breastfeed their infants after their infants receive these preventative measures. [1,2]

Holder pasteurization (62.5 degrees C for 30 minutes) decreases the concentration of endogenous immunoglobulin G by up to 79%.[3,4] A study of 67 colostrum samples that underwent Holder pasteurization found that IgG amounts decreased by 34 to 40%.[5] None of the studies measured IgG activity.

Drug Levels

Maternal Levels. Colostrum (3 days postpartum) and milk (7 days postpartum) samples from 2 mothers who were receiving intravenous immunoglobulin (IVIG) for the treatment of common variable immunodeficiency were studied. One mother was receiving 400 to 500 mg/kg of IVIG monthly and the other received 600 to 700 mg/kg of IVIG monthly. The time of the last dose before sample collection was not reported. Immune globulin (IgG) concentrations were normal in the first mother's colostrum and milk and higher than normal in the colostrum of the second mother. IgM levels were normal in the colostrum and milk first mother and low in the second.[6]

Infant Levels. Relevant published information was not found as of the revision date.

Effects in Breastfed Infants

Relevant published information was not found as of the revision date.

Disclaimer: Information presented in this database is not meant as a substitute for professional judgment. You should consult your healthcare provider for breastfeeding advice related to your particular situation. The U.S. government does not warrant or assume any liability or responsibility for the accuracy or completeness of the information on this Site .

Effects on Lactation and Breastmilk

Relevant published information was not found as of the revision date.

References

- 1. Visvanathan K, Dusheiko G, Giles M, et al. Managing HBV in pregnancy. Prevention, prophylaxis, treatment and follow-up: Position paper produced by Australian, UK and New Zealand key opinion leaders. Gut. 2016;65:340–50. PubMed PMID: 26475631.
- 2. Dionne-Odom J, Tita AT, Silverman NS. #38: Hepatitis B in pregnancy screening, treatment, and prevention of vertical transmission. Am J Obstet Gynecol. 2016;214:6–14. PubMed PMID: 26454123.
- 3. Koenig A, de Albuquerque Diniz EM, Barbosa SF, et al. Immunologic factors in human milk: The effects of gestational age and pasteurization. J Hum Lact. 2005;21:439–43. PubMed PMID: 16280560.
- 4. Adhisivam B, Vishnu Bhat B, Rao K, et al. Effect of Holder pasteurization on macronutrients and immunoglobulin profile of pooled donor human milk. J Matern Fetal Neonatal Med. 2019;32:3016–9. PubMed PMID: 29587541.
- 5. Rodriguez-Camejo C, Puyol A, Fazio L, et al. Antibody profile of colostrum and the effect of processing in human milk banks: Implications in immunoregulatory properties. J Hum Lact. 2018;34:137–47. PubMed PMID: 28586632.
- 6. Palmeira P, Costa-Carvalho BT, Arslanian C, et al. Transfer of antibodies across the placenta and in breast milk from mothers on intravenous immunoglobulin. Pediatr Allergy Immunol. 2009;20:528–35. PubMed PMID: 19220771.

Substance Identification

Substance Name

Hepatitis B Immune Globulin (Human)

CAS Registry Number

373609-41-7

Drug Class

Breast Feeding

Lactation

Antibodies

Immunoglobulin G

Immunoglobulins