Supplementary Methods

Hepatitis B and C serological tests

The first anti-HBc assay used was the Abbott Anti-HBcore Total done on the Architect platform (Abbott Diagnostics, Delkenheim, Germany). The negative cut off for this assay was <1.0 and positive cut off was >2.0. Any equivocal results on this assay were confirmed using the Biomerieux Anti-HBcore Total done on the Vidas platform (BioMerieux, Lyon, France) if sufficient sample was available. The positive cut off on this assay was < 1.0 with a negative cut off of >1.40

The first HB surface antigen assay used was the Abbott on the Architect platform <0.99 negative cut off , positive cut off >50, values greater than 1 up to and including 50 were weakly positive, and those between 0.99 and 1 were equivocal. Weakly positive and equivocal samples underwent a second assay if sufficient sample was available on the Liaison platform (Diasorin, Saluggia, Italy) with positive cut off >10 and negative cut off < 0.9. All positive samples underwent a further hepatitis B surface antigen neutralisation assay for confirmation (again if sufficient sample available) on the Architect platform (Abbott Diagnostics)

Hepatitis B surface antibody assay used was the Abbott anti HB surface antibody on the Architect platform. Negative cut off < 10 IU/ml. Positive cut off >10 IU/ml.
The initial hepatitis C antibody assay used was the Abbott Architect hepatitis C IgG assay positive cut off >4 negative cut off <1. Equivocal and positive samples underwent testing for hepatitis C RNA and if negtive underwent a second antibody assay on the Monolisa platform(Bio-Rad laboratories Ltd, Hemel Hempstead, UK).

Galactomannan Enzyme Immunoassay

Reference laboratory testing of galactomannan on IVIG products was performed manually using the Bio-Rad Platelia™ Aspergillus EIA kit, as per manufacturer's instructions. Testing of serum at the RFH NHS microbiology laboratory was performed on the DS2 platform. For both assays serum was added to treatment solution in a 3:1 ratio (either 360µl of serum and 120 µl of treatment solution or 300 µl serum and 100 µl of treatment solution, for DS2 and manual processing, respectively). Sample pre-treatment was performed in a Class 2 biological safety cabinet. Liquid handling processes were identical for manual and DS2 processing. For reference laboratory testing a bench top plate washer was utilised (5 stringent washes). The DS2 wash cycle program was as follows; a five cycle super sweep wash strip wise with constant timing set to four dispense loops, a bottom wash with 250ul and a final aspirate cycle with 380ul of wash buffer.

Supplementary Figures

Figure S1

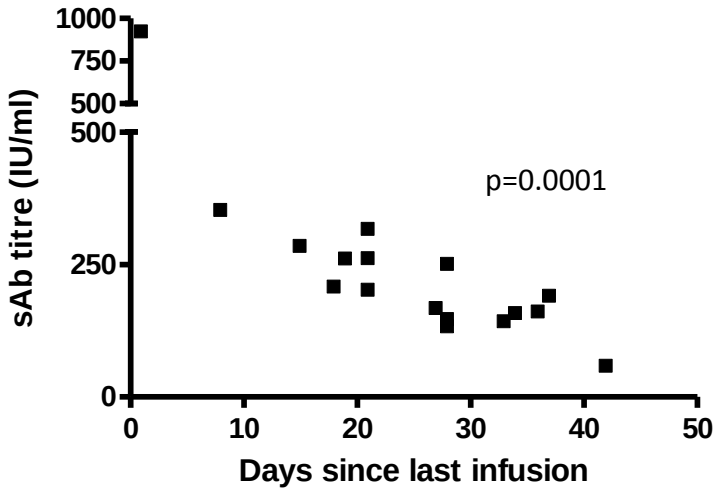

Figure S1. Hepatitis B sAb titres are presented versus time since infusion for patients established on replacement-dose Privigen® treatment (n=17). p-value from Pearson correlation (r = -0.79).

Figure S2

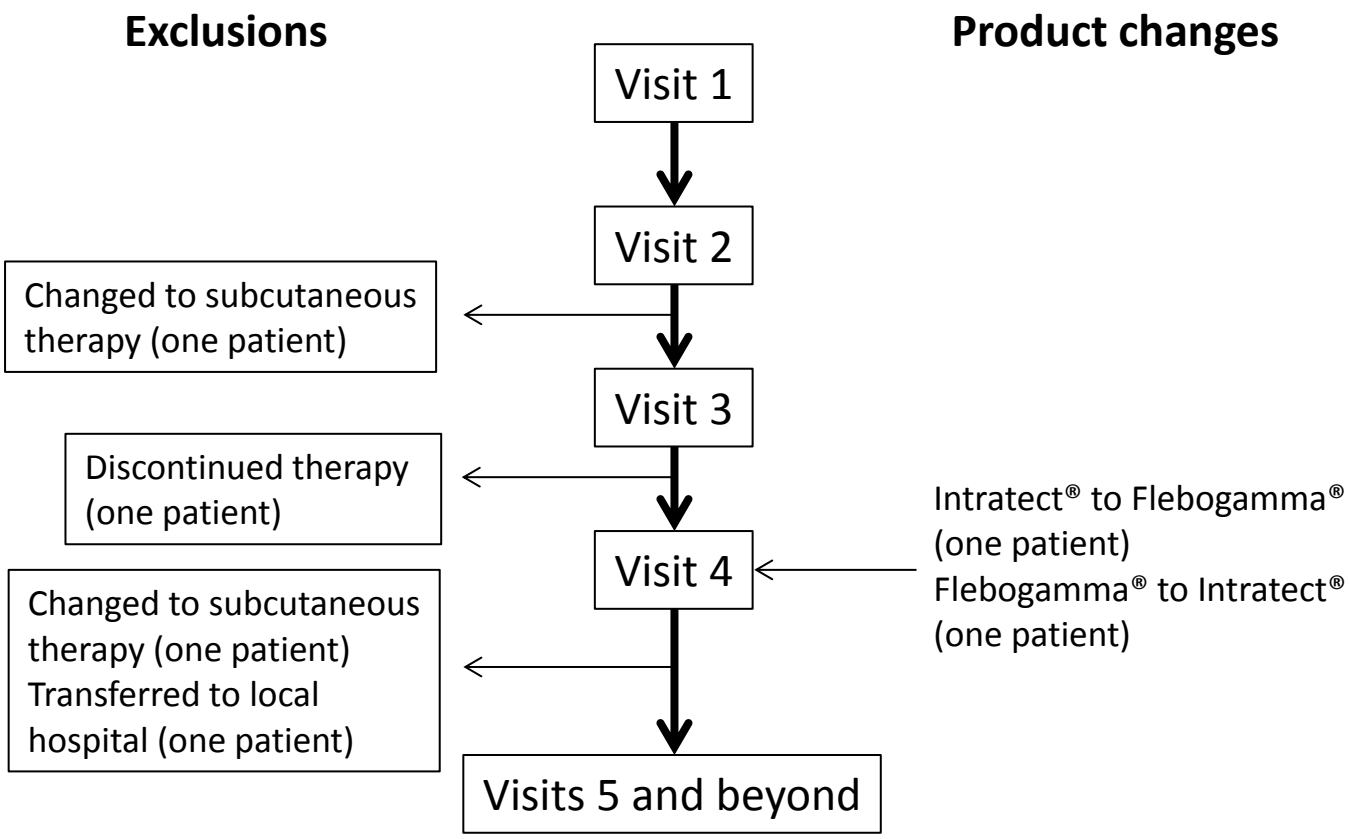

Figure S2. Schema detailing reasons for exclusion or product changes for 16 patients analysed prospectively commencing intravenous immunoglobulin.

Figure S3

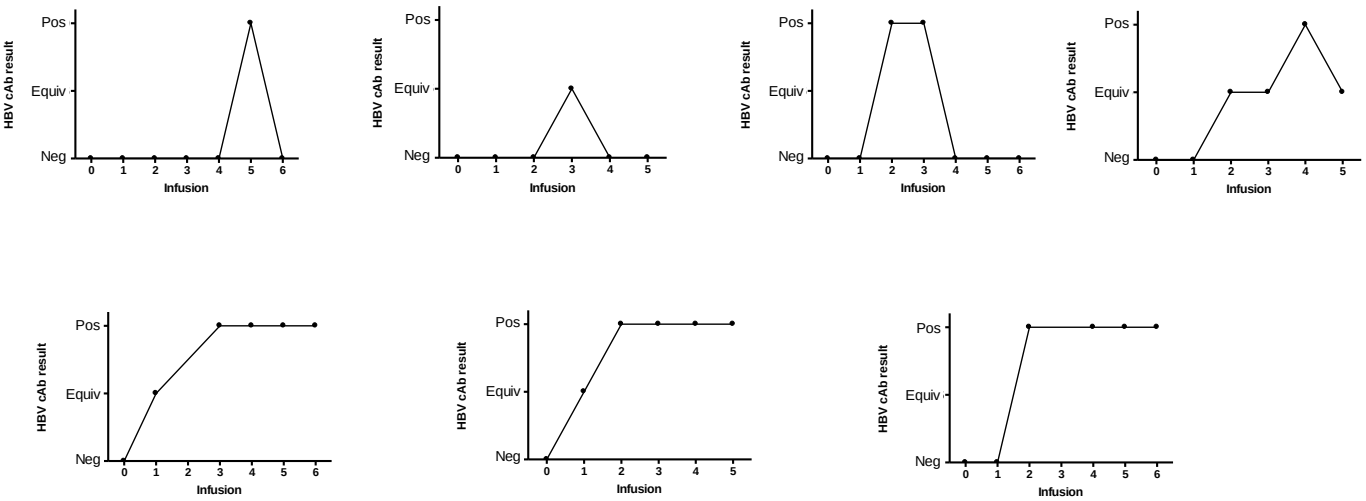

Figure S3. Results are presented for Hepatitis B cAb according to infusion number (0 = pre-IVIG) for individual patients (each graph represents one patient). Patients with product changes or no positive/equivocal results not included.