### Background

- **Extended Half-life (EHL)** Recombinant Factor (F) products is a new therapy approved by the US Food and Drug Administration (FDA) for the treatment of hemophilia A and B.
- **Half-life** is a measure of the duration the coagulation factor product remains in the bloodstream after administration.
- **Recruitment** for the study included patients on prophylaxis (every 6 to 12 days of 1% of FVIII or FIX by FVIII or FIX activity level).
- **Primary endpoints** were the cost of care for hemophilia A and B and the cumulative units of product used.
- **Programs** included Janssen (NovoSeven®), Biogen (Eloctate®), Baxter (Berlex, Biopherix®, and InVivo), and streak charts.
- **Procedures** included pharmacovigilance data collection and reimbursement data from all pharmacy and medical claims for a hemophilia treatment center (HTC).
- **Bleeding events** were defined as any event associated with a hospital visit and reported in the treatment log.

### Methods

- **Completeness of medical and pharmacy claims data** was assessed for the entire study period.
- **Analysis** was performed using medical claims data from 1 January 2013 to 30 June 2017.
- **Costs described** are allowed amounts, sum of plan cost-sharing, and reimbursement.
- **Data collection** included member demographics, Charlson score, and adherence to therapy.
- **Patient daily logs** would not be assessed because administrative claims lack information about prescribed dosing and timing of dosing.
- **Bleeding events in hemophilia** usually do not result in immediate hospitalization.
- **Possible changes in adherence to therapy** could not be assessed because administrative claims lack information about the regimen used at home.

### Results

- **Table 1a and 2a** shows the percentage of hemophilia B members with a hemophilia product claim† over 4.5 years.
- **Table 1b and 2b** shows the percentage of hemophilia members with a hemophilia product claim† over 36 months.
- **Figure 1a and 1b** depicts the percentage of hemophilia members with a hemophilia product claim† over 4.5 years.
- **Figure 2a and 2b** depicts the percentage of hemophilia B members with a hemophilia product claim† over 36 months.

### Limitations

- **Due to the tally of source hemophilia and not factor costs,** the findings of the study are not directly used to make recommendations.
- **Possible changes in adherence to treatment** could not be assessed because administrative claims lack information about the regimen used at home.
- **Bleeding events in hemophilia** usually do not result in immediate hospitalization.
- **Possible changes in adherence to therapy** could not be assessed because administrative claims lack information about the regimen used at home.

### Conclusions

- **Adherence** to a regimen of recombinant factor VIII (FVIII) and recombinant factor IX (FIX) is associated with increased costs and cumulative units of product used.
- **For the 4.5-year period,** the cost per hemophilia A member treated with FVIII EHL products increased 18% to $127,168 and 21.4% to $15,052, respectively.
- **For the 36-month period,** the cost per hemophilia B member treated with FIX EHL products increased 45% to $300,000.

### References

- **Bleeding events in hemophilia** are defined as any event associated with a hospital visit and reported in the treatment log.
- **Bleeding events in hemophilia** usually do not result in immediate hospitalization.
- **Possible changes in adherence to therapy** could not be assessed because administrative claims lack information about the regimen used at home.
- **Bleeding events in hemophilia** are defined as any event associated with a hospital visit and reported in the treatment log.

### Tables

- **Table 1a and 2a** shows the percentage of hemophilia B members with a hemophilia product claim† over 4.5 years.
- **Table 1b and 2b** shows the percentage of hemophilia members with a hemophilia product claim† over 36 months.
- **Table 2a and 2b** shows the percentage of hemophilia members with a hemophilia product claim† over 36 months.
- **Figure 1a and 1b** depicts the percentage of hemophilia members with a hemophilia product claim† over 4.5 years.
- **Figure 2a and 2b** depicts the percentage of hemophilia B members with a hemophilia product claim† over 36 months.

### Figures

- **Figure 1a and 1b** shows the percentage of hemophilia B members with a hemophilia product claim† over 4.5 years.
- **Figure 2a and 2b** depicts the percentage of hemophilia B members with a hemophilia product claim† over 36 months.

### Acknowledgments

- **No external funding provided for this research.**