Biologic drugs play an important role in the treatment of various advanced health-care conditions such as cancer, rheumatoid arthritis and psoriasis, and like all drugs, they are regulated and approved by the United States Food and Drug Administration.1

Biosimilars are also FDA approved drugs that were developed to be highly similar to biologics at lower costs. The cost of biologics is a factor that contributes to rising health-care plan cost, which is a big concern for most insurance payors and patients.

The Congressional Budget Office (CBO) has estimated that the use of biosimilars could generate savings of about $25 billion over 10 years, roughly 0.5 percent of national prescription drug spending.2

### OBJECTIVES

- The purpose of this study is to determine an estimated cost savings on specialty drugs, with increased use of biosimilars over originator products.
- Savings are calculated based on current claims data and Average Wholesale Price (AWP). (n.d.).

### METHODS

- Based on payors’ claims data and drug usage, this study focused on analysis of three originator products with their corresponding biosimilars.

<table>
<thead>
<tr>
<th>Drugs</th>
<th>Biosimilars</th>
<th>Average Wholesale Price</th>
<th>Market Share</th>
</tr>
</thead>
<tbody>
<tr>
<td>Remicade</td>
<td>Ruxience</td>
<td>$27,000</td>
<td>10%</td>
</tr>
<tr>
<td>Avastin</td>
<td>Mvasi</td>
<td>$51,000</td>
<td>49%</td>
</tr>
<tr>
<td>Rituxan</td>
<td>Rituximab</td>
<td>$90,000</td>
<td>23%</td>
</tr>
</tbody>
</table>

- Data was retrieved from a database of de-identified claims data, and information provided includes the spending and utilization of originator products and biosimilars from their medical health plan benefit between August 2020 – July 2022.

- Savings were calculated by comparing price differences between a biosimilar and its originator product to get an estimated savings percentage off the originator product. The results of this study showed that significant cost savings were calculated by comparing price differences estimated savings range did not take into account specific rebates and discount prices of individual drug product.

### RESULTS

- The utilization of biosimilars varies considerably by drug and claims data information but all three studied products showed lower utilization of biosimilars among all payors who participated in this study. Overall 22% of all Infliximab claims, 49% of all Bevacizumab claims and 48% of all Rituximab claims are biosimilar products.

### DISCUSSION

- Approximately $1,000,000 in savings could have been realized through extensive usage of biosimilar drugs for infliximab, bevacizumab and rituximab as opposed to originator products.
- Potential cost saving to payors were estimated at an average of $680,000 for infliximab, $77,000 for bevacizumab and $145,000 for rituximab, if all the current originator product’s utilization had been replaced by the biosimilar at 100% substitution rate. At a 25% substitution rate, payors could have saved an average of $226,000 dollars as well if biosimilar use is increased.

### LIMITATIONS

- Not all available biosimilar products for the studied originator products were as included in this study.
- Lack of information on payor-specific rebates and discount prices may have influenced the savings calculation.

### CONCLUSION

- The results of this study showed that significant cost savings can be realized through increased use of the biosimilars.
- To generate savings and promote price competition, it is important that payors consider their options and utilize the full savings potential offered by each product.
- There are several biosimilars in the pipeline to help improve drug utilization and reduce cost of medications.

### ACKNOWLEDGEMENT

Special thanks to all the participating payors for providing the data utilized in this study. Thanks to all my mentors and the SIUE School of Pharmacy.

### REFERENCES