Cost opportunity of Polatuzumab vedotin as first-line therapy for DLBCL on subsequent treatments - Brazilian cost analysis

Samir Nabhan[1], Douglas Castro[2], Veronica E. Mata[2]

1. Hospital de Clínicas de Curitiba - Universidade do Paraná, Curitiba, Brazil, 2. F. Hoffmann-La Roche Ltd, São Paulo, Brazil..

EE98

OBJECTIVES

- To analyze the direct cost of treating Diffuse large B-cell lymphoma (DLBCL) with polatuzumab vedotin (Pola-R-CHP) as first line (1L) therapy, CAR T-cell as a second line (2L) treatment, or epcoritamab as a third line (3L) therapy.

METHODS

- Quantitative analysis based on an expert panel discussion about the different costs that contribute to the direct medical cost of the treatments (Figure 1).[6]
- The calculations were based on input from the expert panel and a reference patient with a height of 171 centimeters, weight of 70 kg and body surface area of 1,82m2 (Figure 1).[6]
- This analysis considered treatment duration based on clinical evidence, along with the medical direct prices of CMED drugs available in July 2024, laboratory exams, hospitalization, monitoring, and treatment of the principal adverse events.[1,6]

RESULTS

- The total direct cost of treatment with Pola-R-CHP in 1L DLBCL patients is U$S 84,460.52, with CAR T-cell therapy in 2L is U$S 451,675.63, and with epcoritamab in 3L is U$S 398,986.04 (Table 1).[1-9]
- In other words, the cost to treat one patient with CAR T-cell therapy in 2L would cover the treatment of 4.9 patients in 1L with Pola-R-CHP, and the cost to treat one patient with epcoritamab in 3L would cover the treatment of 4.7 patients in 1L with Pola-R-CHP (Figure 2).

Table 1. Treatment cost for DLBCL patients in U$S.

Parameters	Pola Treatment [1-6]	CART-cell treatment (Axi-cel)[1,3-8]	Epicoritamab treatment [1,3-6,9]
	Total Cost		
Therapy	84,460.52	451,675.63	398,986.04
Adverse events			
Monitoring			
Bridging chemotherapy	Not applicable		Not applicable

Figure 2. Proportion of patients who can be treated in 1L at the cost of treatment in 2L or 3L[1-9]

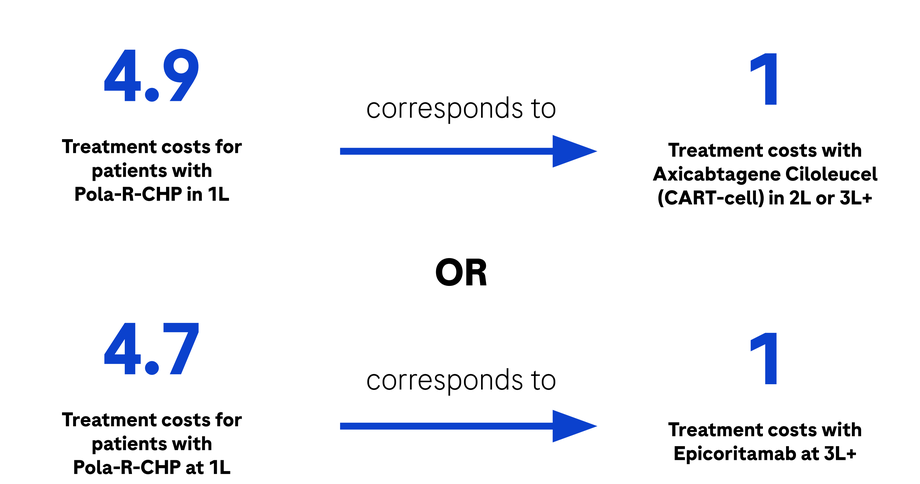

Figure 1. Direct medical costs as considered in the cost model.[1,6]

- **Drug treatment** (generic/similar)
  - CMED Jul/24 PF
  - Biosimilar/generic
- **Monitoring/Monitoring**
- **Most important AEs**

Body measurements

Average weight = 70 kg
Average height 171 cm
Body surface = 1.82 m^2

CONCLUSION

- This study demonstrates the potential to treat and cure more patients in 1L with Pola-R-CHP and provide them with a higher likelihood of avoiding progression compared to other treatments.
- Based on the clinical trials data, the progression disease rate in 1L with Pola-R-CHP, is 23.3% for DLBCL patients and 16.1% for high-risk patients (ABC diagnosis), compared to 54% with CAR T-cell therapy and 72.2% with epcoritamab.[8-11]
- This information could help decision-makers in engaging in evidence-based and value-driven discussions for patients and healthcare systems, promoting greater efficiency and transparency in terms of budget impact and resource allocation.

References:

1. BRASIL. ANVISA. CMED. Lista de preço de medicamentos. Available at: https://www.gov.br/anvisa/pt-br/setorregulado/regularizacao/medicamentos/medicamentos-de-referencia/lista-de-medicamentos-de-referencia; 2. Brasil. PORTARIA Nº 956, DE 26 DE SETEMBRO DE 2014 - Protocolo Clínico e Diretrizes Terapêuticas do Linfoma Difuso de Grandes Células B. Available at: https://www.gov.br/conitec/pt-br/midias/artigos_publicacoes/ddt_linfomadifusob_26092014.pdf/view; 3. Associação médica brasileira (AMB). Câmara Técnica Permanente da CBHPM. 2024. Available at: https://amb.org.br/cbhpm/; 4. Unidas Autogestão em saúde. Pesquisa Nacional da Saúde UNIDAS 2022. Available at: https://www.unidas.org.br/pesquisa-unidas-2022-esta-disponivel-para-download/; 5. Planserv. Tabelas de Contribuição. Available at: https://planserv.ba.gov.br/planserv/beneficiario/tabelas-contribuicao; 6. Roche Brasil. Expert panel led by Origin Brasil; 7. Martín A, et al. R-ESHAP as salvage therapy for patients with relapsed or refractory diffuse large B-cell lymphoma: the influence of prior exposure to rituximab on outcome. A GEL/TAMO study. Haematologica. 2008 Dec;93(12):1829-36. doi: 10.3324/haematol.13440; 8. EPKINLY. ABBVIE FARMACÊUTICA LTDA. [Bula]. Disponível em: https://consultas.anvisa.gov.br/#/bulario/q/?nomeProduto=EPKINLY; 9. Tilly H, et al. Polatuzumab Vedotin in Previously Untreated Diffuse Large B-Cell Lymphoma. N Engl J Med. 2022; 386:351-363; 10. Locke F et al. Axicabtagene Ciloleucel as Second-Line Therapy for Large B-Cell Lymphoma. N Engl J Med. 2022 Feb 17;386(7):640-654; 11. Thieblemont C, Phillips T, Ghesquieres H, et al. Epcoritamab, a Novel, Subcutaneous CD3xCD20 Bispecific T-Cell-Engaging Antibody, in Relapsed or Refractory Large B-Cell Lymphoma: Dose Expansion in a Phase I/II Trial. J Clin Oncol. 2023 Apr 20;41(12):2238-2247. doi: 10.1200/JCO.22.01725.