

Figure 2. Phylogenies of Boston Children's Hospital (BCH) and Global Group B Streptococcus (GBS) isolates. Panel A presents the phylogenetic tree of Group B Streptococcus (GBS) isolates from Boston Children's Hospital (BCH), categorized by age groups: early-onset disease (EOD, diagnosed within 7 days of birth), late-onset disease (LOD, 7 days to 3 months), very late-onset disease (VLOD, 3 months to 1 year), older children (1 to 18 years), and adults (18 years and older). Various virulence factors and surface proteins are detailed, including Alpha-like proteins (ALP1, ALP23, Alpha, RIB), pilus islands (PI-1, PI-2a1, PI-2a2, PI-2b), and other factors such as the hypervirulence gene cluster A (HVGA), serine-rich repeat proteins (SRR1, SRR2), Sip, laminin-binding protein (lmb), C5a peptidase (scpB), hyaluronidase (hylB), and fibrinogen-binding protein (fbsB). Panel B extends the context by situating BCH LOD isolates (in blue on heatmap 6) within a broader phylogenetic framework, including national and global LOD isolates. It features isolates from the USA (yellow on heatmap 6), gathered through the CDC's ABCs program, and from other international sources such as Ireland, Malawi, Canada, and The Netherlands (orange on heatmap 6).