

# Reliable High-Performance Gate Oxides for Wide Band Gap Devices

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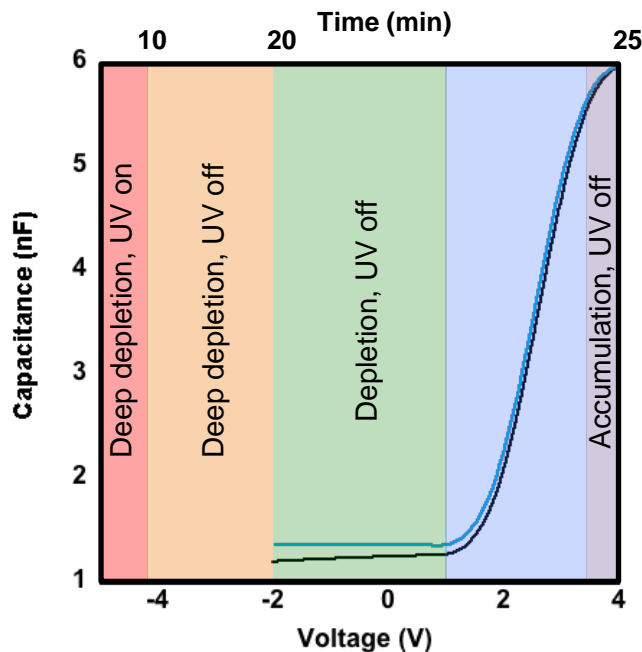
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## Purpose

- Gate dielectrics are a key limiter in GaN- and SiC-based power electronics technology
- Engineered gates will enable the development of robust and reliable MOSFETs and MOSHEMTs

## Impact

- Increased System Performance, Efficiency, and Reliability
- Reduced System Cost
- Reduced Power Electronics Size



MgO  $D_{it}$ :  $4 \times 10^{11} \text{ eV}^{-1} \text{ cm}^{-2}$

CaO  $D_{it}$ :  $3 \times 10^{11} \text{ eV}^{-1} \text{ cm}^{-2}$