$$G\_\sigma(s\_i\hat{k}) = \sum_j l_j exp\left(-\frac{dist\,(b_i, b_j)}{2\sigma^2}\right)(s_j)^k$$

where

- $l_j \in \mathbb{R}$ the length of bj
- $dist \in \mathbb{R}^n, \mathbb{R}^n \to \mathbb{R}$ measures the geodesic distance between the centers of bi and bj along the boundary
- $\sigma \in \mathbb{R}$
- $b_i \in \mathbb{R}^n$
- $b_j \in \mathbb{R}^n$
- $s_j \in \mathbb{R}$ unit direction vector of bi
- $k \in \mathbb{R}$ iteration number