



Figure 5. Quantitative variation in the epigenetic silencing of *FLC* in *Arabidopsis* accessions from different climates. (A) An *Arabidopsis* accession from Germany (*Col*, red line) requires only 4 wk of cold to epigenetically silence *FLC*. *Lov-1*, from the northern limit of its range in Northern Sweden (latitude 62.5°N), sees reactivation of the *FLC* gene if the cold period is so short, resulting in an inability to become vernalized and, hence, does not flower. (B) *Lov-1* needs a much longer period of cold (12 wk) for full epigenetic silencing. Molecular analysis has shown this difference is the result of a small number of *cis* polymorphisms near the PHD-PRC2 nucleation region in intron 1.