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William D. Simmons* (wsimmo@sas.upenn.edu) and **Henry Towsner**
(htowsner@math.upenn.edu). *Mining effective information from nonconstructive proofs in differential algebra.*

Ultraproducts and other nonconstructive tools often yield existence results without explicit values. We examine the interplay of such arguments with "proof mining" techniques that systematically extract effective information even when it is not apparent. Our main result is a uniform bound related to the detection of prime differential ideals. (Received March 14, 2017)