

## **Restabilization of Polyolefin Films Containing Cobalt Stearate as a Photodegradant**

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Littering of plastic film packaging represents a major problem because of poor biodegradability in the natural environment. Polyolefins such polyethylene are commonly used in such applications. All polymer materials age when exposed to sunlight but unfortunately the intrinsic rate is simply too slow. In oxo-biodegradable polymers the rate of mineralization is enhanced by incorporation of prodegradant additives, e.g. metal stearates. However, the presence of such photodegradation catalysts may cause life expectancy problems when the plastic is recycled into more permanent applications, e.g. polyethylene piping. This study will show that suitable additives exist that can impart long-life stabilization of recycled oxo-biodegradable polymers.