Multifunctional Additives:

New Tools in the Coating Formulator's Toolbox

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While additives account for only a small percentage of the total weight or volume of coating formulations, they contribute significantly to the performance of those coatings. Often, formulators vely on numerous different additives to achieve the desired durability, gloss, mar resistance, and other key properties of the final applied film. Some are necessary for controlling the rheology of the paint during the application process. Yet others—for example, dispersants and defoamers—are required to control the properties of the formulation during manufacturing or application processes. With all of the different physical and chemical properties involved, interactions and possible conflicts between different additives are a concern, as are unwanted secondary effects. The development of multifunctional additives that address two or more performance issues at the same time is one approach that many suppliers have taken to overcome some of these challenges.

There are, in fact, many reasons for and potential advantages to using multifunctional additives. "Interest in multifunctional coating additives



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