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## Did you know that Infrared heat helps airbags to inflate more easily?



In an accident, it is important, that an airbag inflates immediately. The silicone coating plays there a major roll. Airbags are made out of a fabric, which is coated with silicone. This smooth coating ensures that the cushion will unfold fast and without sticking when deployed. This fabric is called Nylon 66. Nylon 66 is very hydroscopic, this is causing a problem at the coating stage for the heavier cloth used for inflatable curtains. It is necessary to reduce the cloth's moisture content down to 2% to ensure the correct adhesion, drying and surface finish of the silicone coating and to reduce scrap levels. In operation, the infrared system is controlled by an optical pyrometer, which measures the surface temperature of

the fabric and then transmits a signal to regulate the power of emitters within the infrared module, which is mounted above the fabric web. The cloth is coated with silicone on both sides but the critical heating operation takes place just before the coating is applied to the bottom side. It is essential that the moisture is removed before this bottom coating is applied, otherwise it will be sealed in, potentially causing damage to the final surface finish. The infrared module can be retrofitted very easily into an existing coating line, and the fast response of the carbon emitters means that there is no damage to the coated fabric in the event of unexpected line stoppage.

Further questions related to the "International Year of the Light"?

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