

LOCTITE®

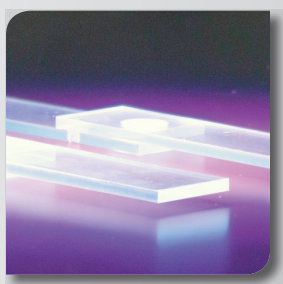


LIGHT CURABLE ADHESIVES

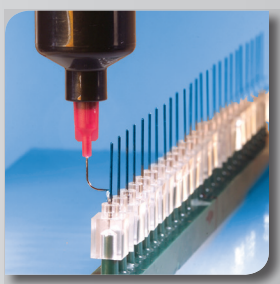
ENABLING SAFER, SIMPLER, FASTER MANUFACTURING

Formulated with focus on safer ingredients for use in medical devices including wearables – Tested to Henkel's protocols based upon ISO 10993 biocompatibility standards • ISO 10993-5,-10,-11,-4,-6 • LED & UV curable • Highly fluorescent for high speed inspection

High Strength & Durability



Low Viscosity



LED Curable (Fast & Tack-Free)



Highly Fluorescent



Henkel's light cure adhesive materials are qualified in applications of **standard medical disposables** as well as applications in the **wearables market**. These medical device adhesives are ideally suited for the assembly of a variety of devices including but not limited to:



- Catheters
- Blood collection sets
- Syringes & lancets
- Drug delivery devices
- Anesthesia, epidural & insulin syringes
- Blood oxygenators
- Blood filters
- Heat exchangers
- Blood bowls
- Manifolds
- Blood pressure transducers

To learn more about Henkel's newest light cure innovations visit Henkel-adhesives.com/medical





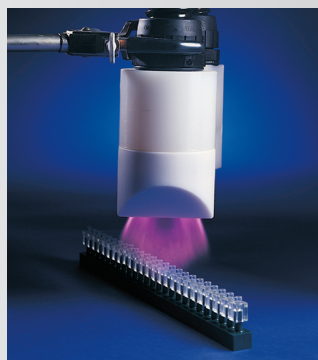
LOCTITE® AA 3961 and AA 3963 are the latest light cure innovations from Henkel. They have been tested to Henkel's protocols based upon ISO-10993 biocompatibility standards:

- **ISO 10993-5:** Cytotoxicity
- **ISO 10993-10:** Intracutaneous Reactivity
- **ISO 10993-11:** Systemic Toxicity
- **ISO 10993-4:** Hemolysis
- **ISO 10993-6:** Two weeks Muscle Implantation



KEY PROPERTIES*	AA 3961	AA 3963
Viscosity (cP)	60	300
Appearance (uncured)	Clear, colorless	Clear, colorless
Fluorescence (uncured/cured)	High	High
Fixture Speed with 405 NM LED Curing System (secs)	< 5	< 5
Shear Strength on Polycarbonate Blocks (PSI)	3,000	3,400
Needle Pullout Strength on Polycarbonate Hubs & 27 Gauge SS Needle (lb-f)	36	33
Shore Hardness (Shore D)	71	72

*Estimated values. Please consult the LOCTITE® TDS for additional data and details.



SURFACE TREATMENT:

Polyolefins such as polyethylene (PE) and polypropylene (PP) are often used for disposable medical devices due to their low cost and versatile properties. Since PE and PP are difficult-to-bond plastics, it is common to treat the plastic before assembly to increase the pull strength. Corona, plasma and other pretreatment methods have been shown to increase bond strengths on difficult-to-bond materials when using LOCTITE® AA 3961 or AA 3963.

REGIONAL HEADQUARTERS

AMERICAS

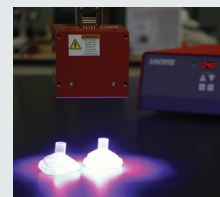
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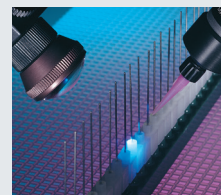
CURING

LOCTITE® AA 3961 and AA 3963 can be cured with UV or visible light. Henkel's newest LED curing units are ideally suited for rapid curing of select Henkel adhesives.



DISPENSING

LOCTITE® AA 3961 and AA 3963 can be dispensed manually or with LOCTITE® semi-automated and fully automated systems. See www.equipment.LOCTITE.com for more details.



DETECTION

LOCTITE® AA 3961 and AA 3963 contain fluorescent additives allowing for detection in the uncured or cured state. Detection can be accomplished with a simple black light or with vision systems

