CORNING

Flexible Glass: Advantages for Today, Advancements for Tomorrow

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Forward-looking and cautionary statements

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Topics

- What is Corning[®] Willow[™] Glass?
- Advantages of Willow Glass over other substrate materials
- Applications that will benefit from Willow Glass



What is Corning[®] Willow[™] Glass?



Ultra-slim flexible glass is a 50-200µm thick glass



1m wide, ≥300m long spool and Gen5 sheet of thin flexible glass

Over Thicker Glass

- Flexible/conformable
- 7x reduction in weight
- 7x reduction in thickness
- ~50% process cost reduction by enabling roll to roll processing

Over Plastic

Perfect barrier

ADVANTAGES

- ~7% better transparency
- High T processing over 500°C



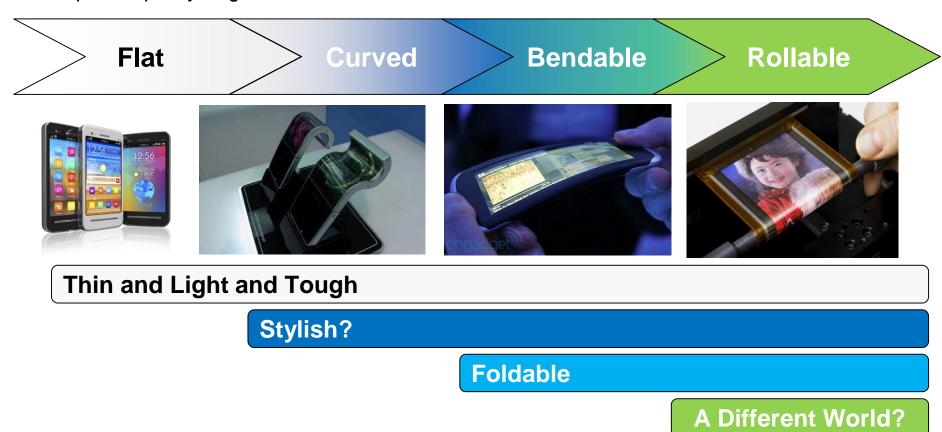
Thin and light = Increased value

Mobile	Slate / NB	Monitor	TV	E-reader
		Form Factor		************
Thin and Durable	• Thin, Light and Durable	• Thin	• Thin	• Thin, Light and Durable
Seamless	 Seamless 	Seamless	 Seamless 	
	 Slim bezel 	Slim bezel	 Slim bezel 	
	Pa	anel Performand	e	
Power	Power	Power	Power	Color
 Resolution 	Color shift (slate)		Resolution	Contrast
Durability	Durability		Motion blur	Reflectivity
2 3.7 3.15	·		Durability	 Rewriting speed
		New Features		
		- New realures		
Touch	Touch (slate)	• 3D	• IPTV	Touch
• 3D?	• 3D?		• 3D	



What drives need for flexible display substrates?

- Conformable before flexible value added application for conformable displays exist
- Ahead of the cost curve through R2R processing flexibility of plastic processing with superior quality of glass substrates



Cost-efficient, high performance displays – Flexible glass addresses the challenge



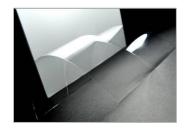
Customer Need Flexible Glass Advantages

Corning Delivers

Alternative materials

High device performance

Glass attributes in a thin, flexible format



Efficient processing

High device performance with efficient total system

Highly efficient manufacturing ecosystem



Differentiated products

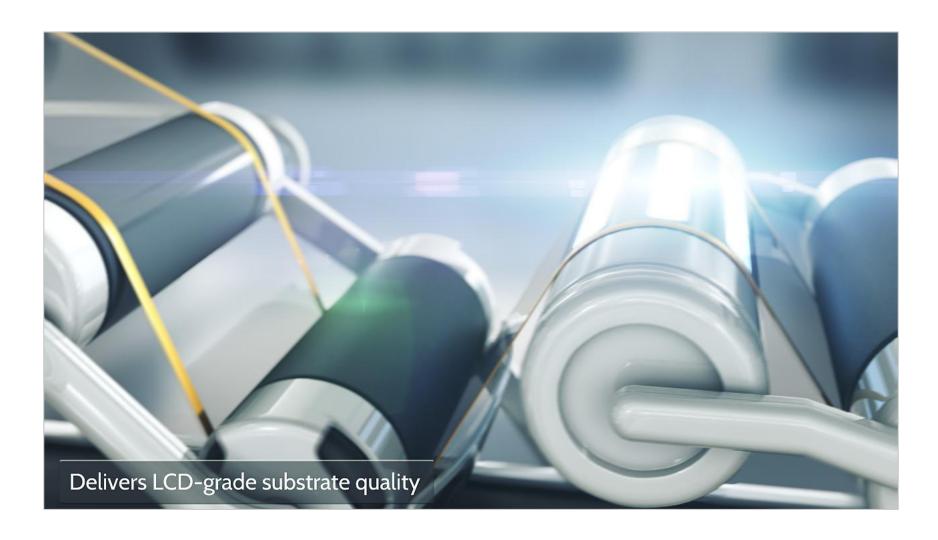
Enables new markets and technologies

Added functions – flexibility, durability, active thin films, etc.



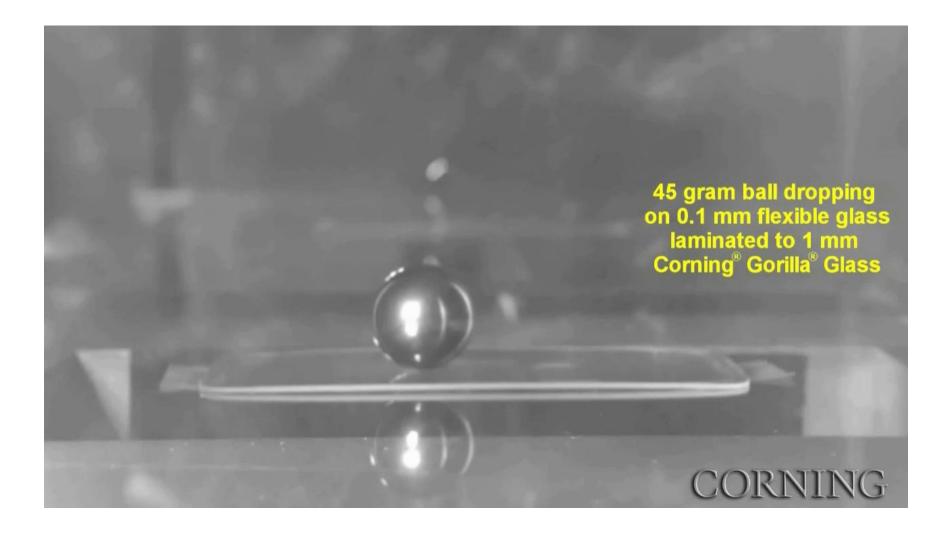


Corning® Willow™ Glass will help revolutionize electronics processing





Compatible with high reliability devices





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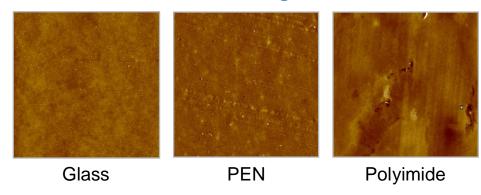
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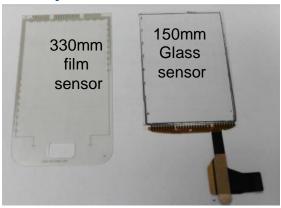


Flexible glass enables device performance

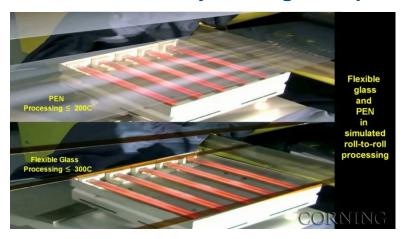
Surface Roughness



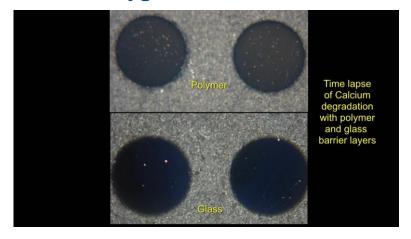
Optical Transmission



Dimensional Stability and High T capable



Oxygen/water barrier



Applications for Corning[®] Willow™ Glass demonstrated at SID Display Week 2012 – Booth 123

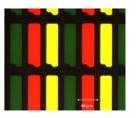
Touch

- 3x thinner than highperformance film sensor
- 2% points higher transmission
- 5X lower haze
- 2.5X lower b value



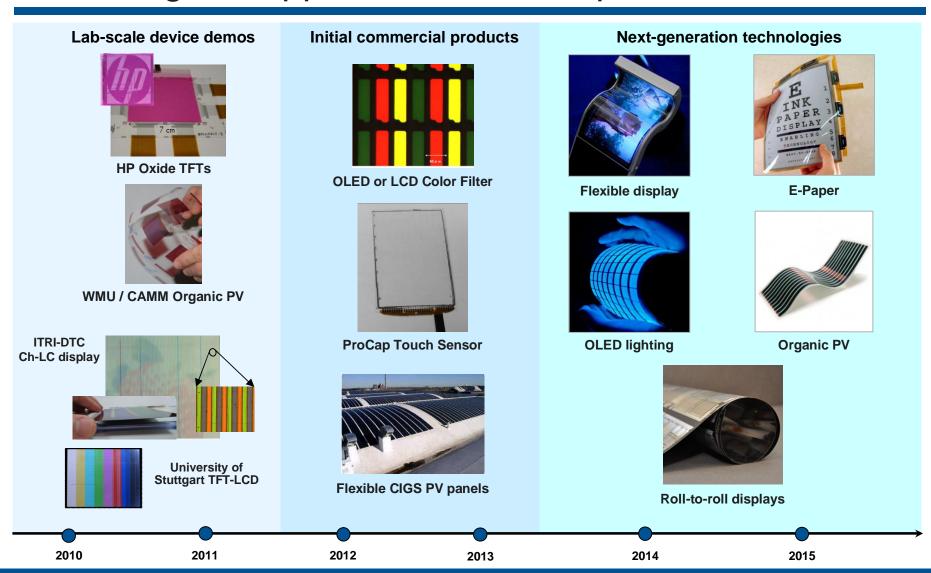
Color Filter

- 5x thinner than rigid glass color filter
- No additional thinning needed
- Delivers same resolution and brightness
- Compatible with on-cell touch



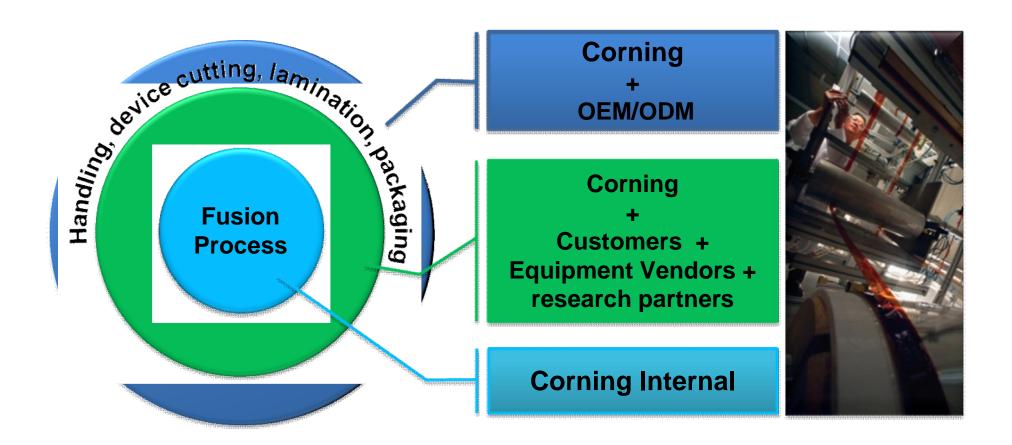


Flexible glass applications roadmap





Flexible Glass Ecosystem Development Plan





Flexible glass availability

Now



Q4 2012



2013





ITO - Coated

Sheet	
Rolls	
Quantity	

Sheets	250mm x 300mm	Gen 5 1000mm x1200mm	>Gen 5 1000mm x1200mm	TBD
Rolls	10m long x 300mm wide	~300m long x Up to 1m wide	~300m long x Up to 1m wide	~300m long x 500mm wide
uantity	Development quantities	Engineering quantities	Pilot production	Engineering quantities

Note: Dimensions reflect maximum available sizes



Corning® Willow™ Glass: Superior attributes delivering superior displays and efficient processes

High-Performance Glass Substrate

- High T processing
- Excellent optical quality
- Unmatched barrier properties
- Compatible with sheetbased or roll-to-roll processing

Superior Displays

- Thin
- Light
- Curved
- Flexible
- Cost-efficient



The last word...

- The future is flexible
- The future is here
- Glass Matters...Glass Works...Corning glass works

Forward-looking and cautionary statements

This presentation contains forward looking statements that involve a variety of business risks and other uncertainties that could cause actual results to differ materially. These risks and uncertainties include the possibility of changes or fluctuations in global economic conditions; currency exchange rates; product demand and industry capacity; competitive products and pricing; availability and costs of critical components and materials; new product development and commercialization; order activity and demand from major customers; capital spending by larger customers in the telecommunications industry and other business segments; the mix of sales between premium and non-premium products; possible disruption in commercial activities due to terrorist activity and armed conflict; ability to obtain financing and capital on commercially reasonable terms; acquisition and divestiture activities; the level of excess or obsolete inventory; the ability to enforce patents; product and components performance issues; and litigation. These and other risk factors are identified in Corning's filings with the Securities and Exchange Commission. Forward looking statements speak only as of the day that they are made, and Corning undertakes no obligation to update them in light of new information or future events.

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