



The US EPA View

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ENERGY STAR Product Development

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Today's Topics



- History of International Voluntary Labeling Coordination
- How ENERGY STAR Works: Guiding Principles
- Dispelling Myths about ENERGY STAR
- ENERGY STAR: The Way Forward
- Accomplishments
- Future Priorities & Timeline

History of International Voluntary Labeling Coordination



- ENERGY STAR originated in 1992.
- ENERGY STAR mark used by many **companies** from around the world to promote products globally
 - ENERGY STAR product manufacturing partners can use mark in any country
- **Governments** coordinate with US EPA to use ENERGY STAR as their platform to promote efficient products
 - The EU uses ENERGY STAR only for office equipment

History of International Voluntary Labeling Coordination



- Japan (1995) - OE
 - Australia (1996) - OE & CE
 - New Zealand (1997) - OE; considering CE & other products
 - Taiwan - (1999) OE
 - European Union - (2000) OE
 - Canada - (2001) most products
-
- China – informal cooperation across a variety of products

ENERGY STAR Philosophy – Guiding Principles for Specification Development

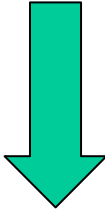
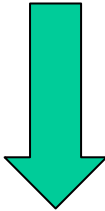
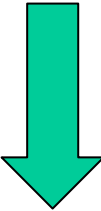


- Significant energy savings potential
- Purchasers will recover their investment in increased energy efficiency within a reasonable time period
- Product performance can be maintained or enhanced
- Efficiency can be achieved with multiple distinct technology options in the market
- Product energy consumption & performance can be measured & verified with testing
- Labeling would effectively differentiate products & be visible for purchasers

Dispelling the Myths: #1

ENERGY STAR OE specifications save energy



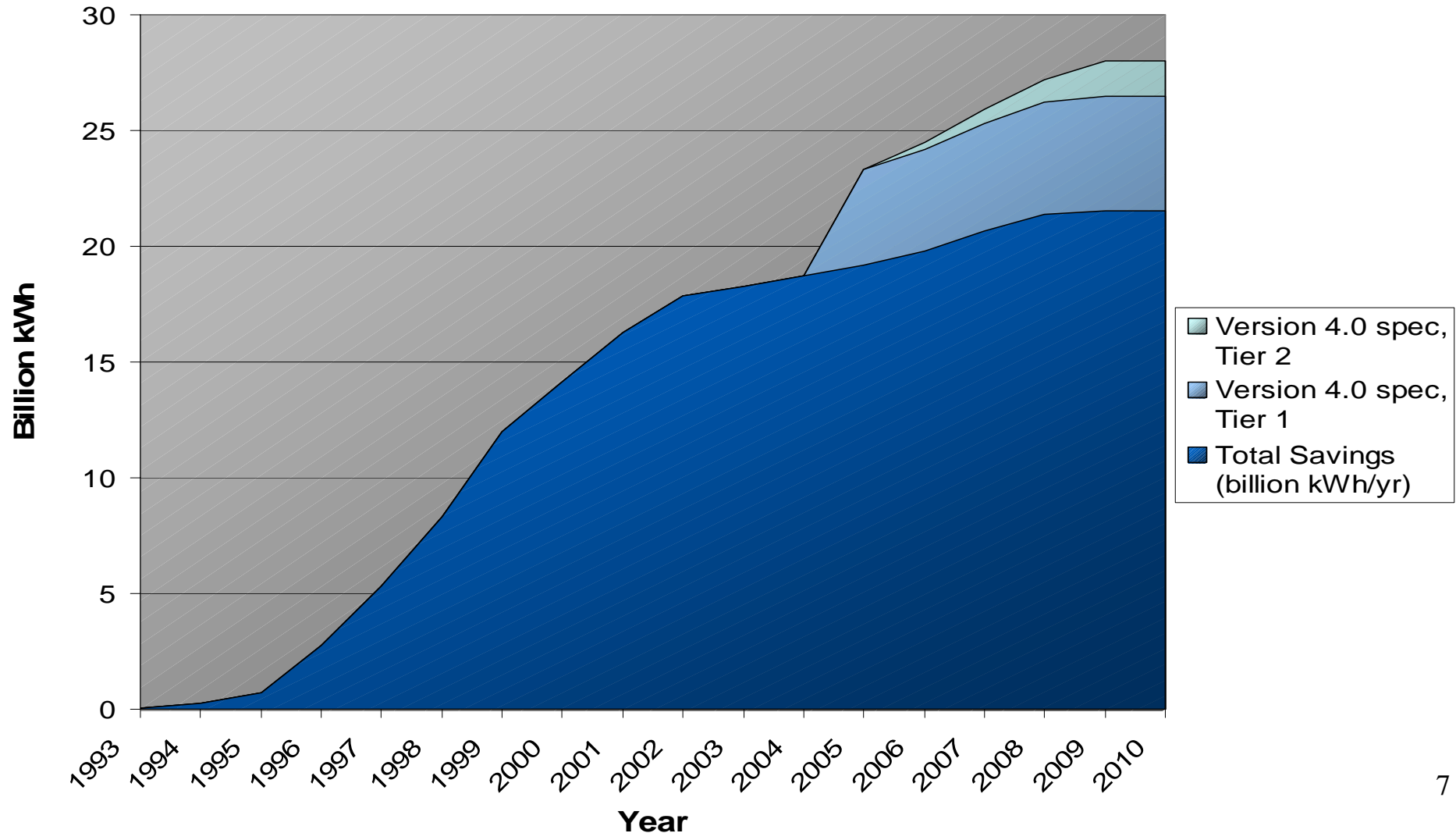
- Monitor Sleep levels 92%
 - 25 watts in 1993
 - 2 watts in 2006
- Monitor unit energy consumption 91%
 - 411 kWh UEC in 1992
 - 35 kWh UEC in 2006
- Total monitor kWh consumed annually 41%
 - 58,374 million kWh in 2004 without ENERGY STAR
 - 34,654 million kWh in 2004 with ENERGY STAR

Dispelling the Myths: #1

ENERGY STAR OE specifications save energy

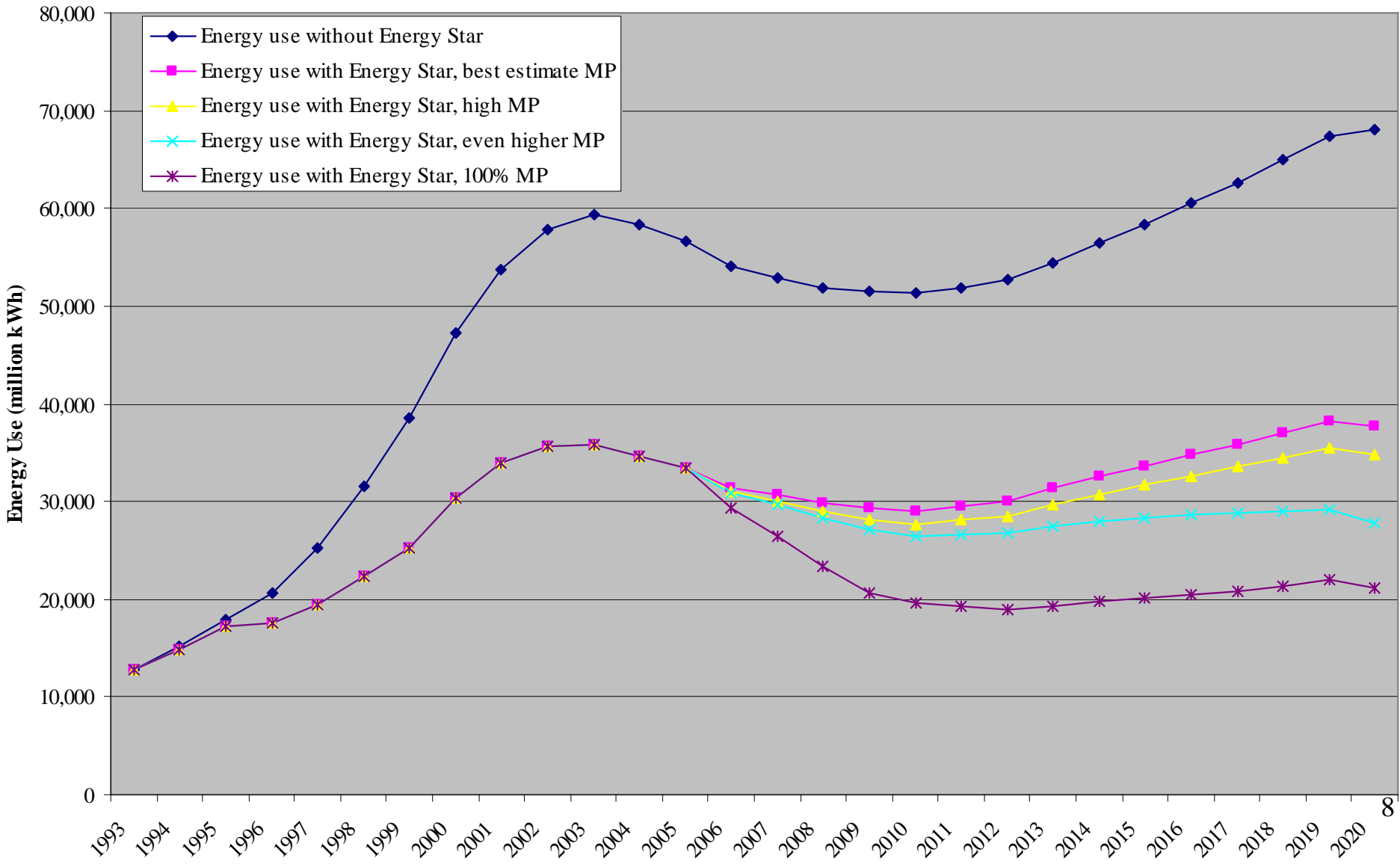


Monitor Savings 1993-2010



Dispelling the Myths: #1

ENERGY STAR OE specifications save energy


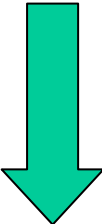


Dispelling the Myths: #1

ENERGY STAR OE specifications save energy



In 2010, total monitor energy consumption is expected to be 9.2 billion kWh lower than it was in 2003 and 1.7 billion kWh lower than in 2000, in spite of the stock of monitors having increased from 84 million in 2000 to 107 million in 2003 and 108 million in 2010

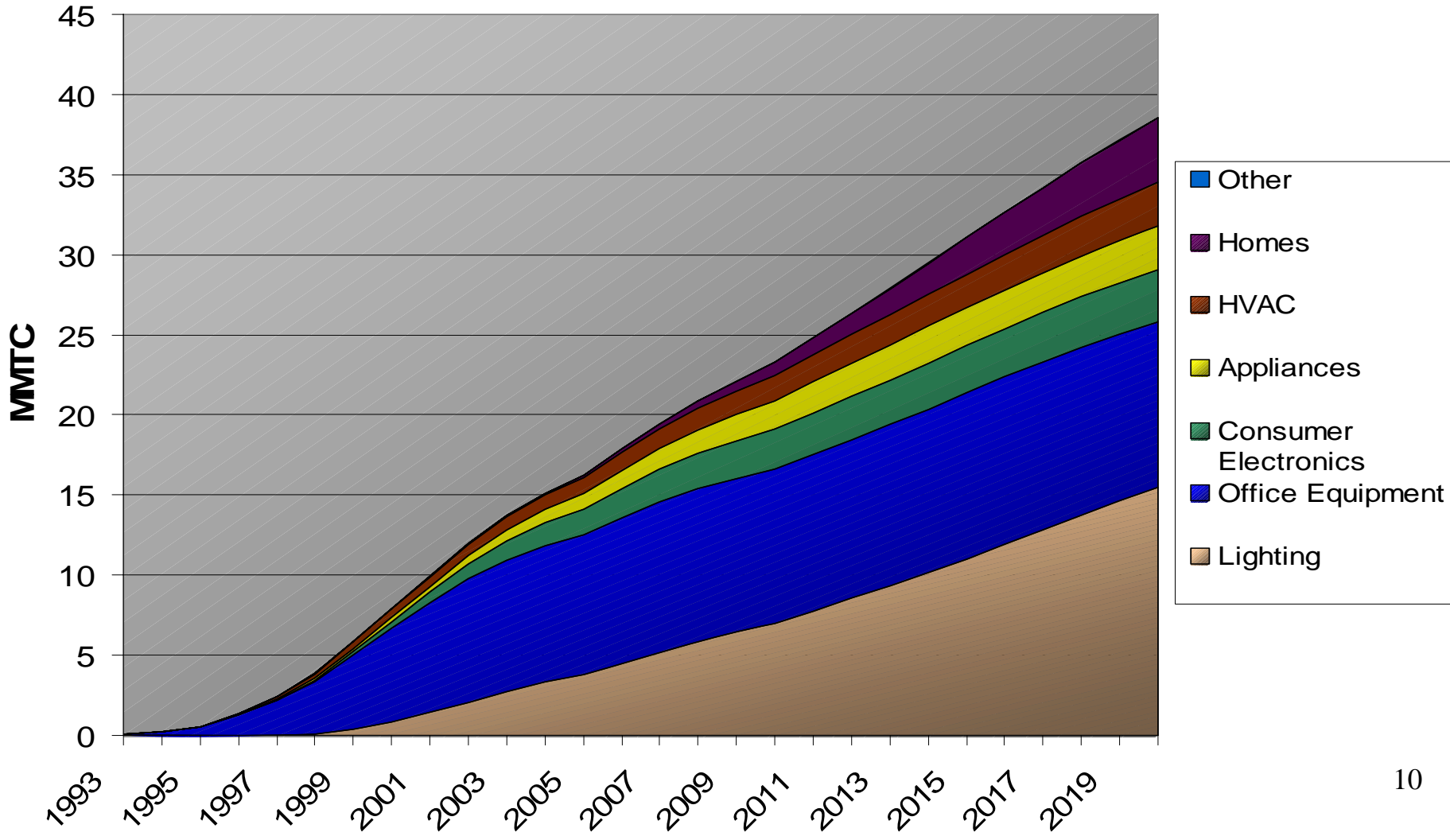
Year	Stock		Energy Use	
2000	84 M	 22%	37B kWh	 4%
2003	107M		44.8B kWh	
2010	108M		35.5B kWh	

Dispelling the Myths: #1

ENERGY STAR specifications prevent pollution



ENERGY STAR Carbon Savings By Product Group 1993-2020



Dispelling the Myths: #2



- ENERGY STAR guided by principle, not political pressure
 - Specification setting is a collaborative process
 - Solicits input from a range of stakeholders
 - Weighs input against ENERGY STAR principles & attempts to strike the right balance
 - Employ feedback loops
- ENERGY STAR product penetration rates
 - Seek to capture approximately 25% of products when specifications are set
- US federal procurement order provides a powerful incentive for industry to make meaningful energy reductions quickly and broadly

ENERGY STAR: The Way Forward

-- Value Proposition --



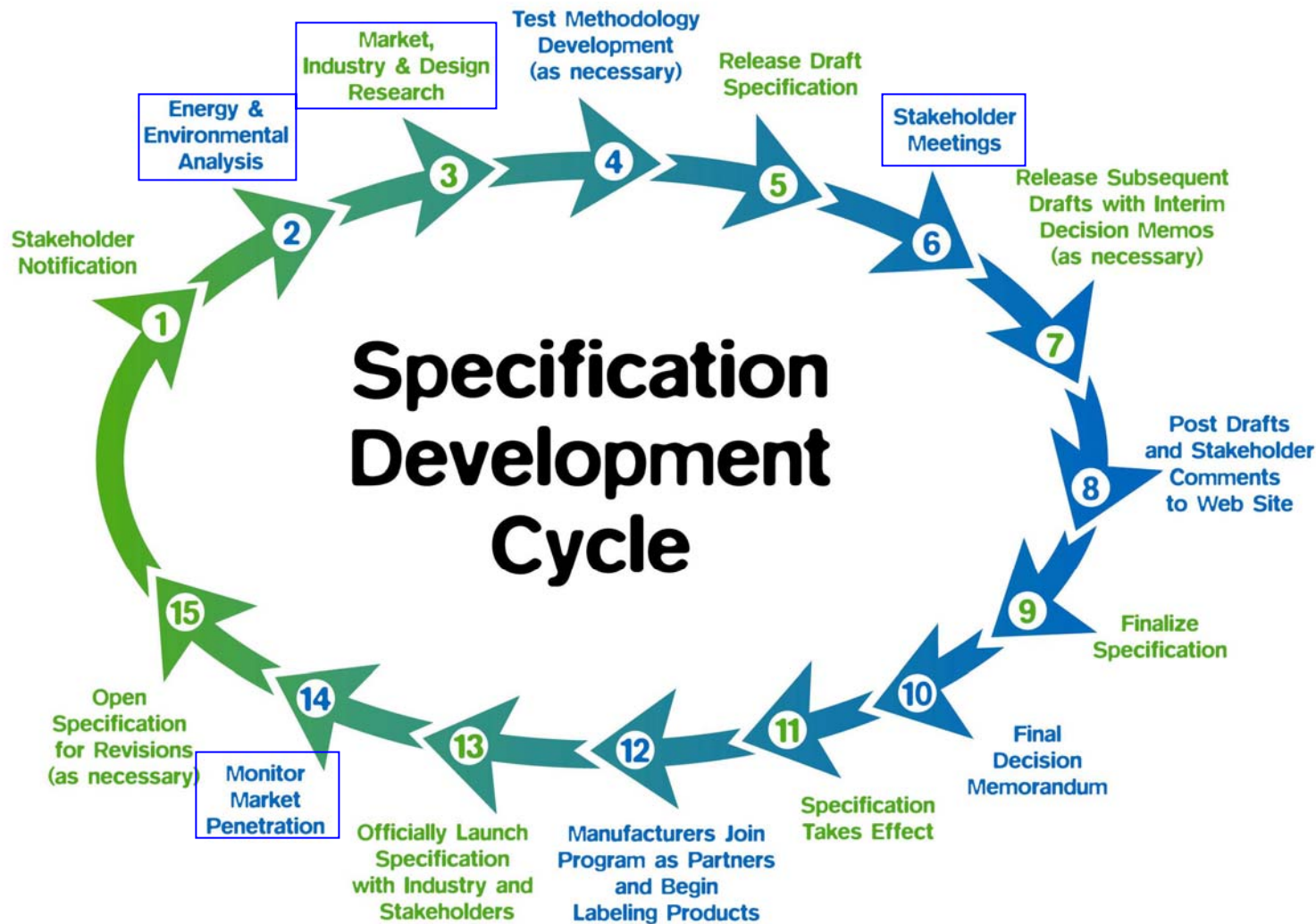
- Policymakers & manufacturers both benefit by leveraging limited resources & sharing valuable knowledge
- Cooperation can lead to one specification & test procedure for globally-traded products
 - Minimizes manufacturers' cost of participation & compliance
 - Ensures comparability of efficiency claims worldwide
 - Voluntary labeling is a viable policy option that compliments minimum efficiency standards.
 - Countries with 2 billion + people use voluntary labeling schemes
- Government coordination facilitates specification levels based on a global data set
- Institutionalized efficiency as a design criteria

ENERGY STAR: The Way Forward



- Developed relationships with industry & policymakers from around the world
- Developed a core process to:
 - Create new specifications
 - Revise existing specifications
 - Testing to improve quality
 - Model energy consumption to quantify impacts
- Continue to expand: new product opportunities and modes
 - Active mode for OE and CE

Process – Steps to Setting ENERGY STAR Specifications



US EPA - EU ENERGY STAR Agreement



- Either party can initiate specification revision or new product specification
 - EU-EPA Agreement says:
 - “Either Management Entity may propose and amendment to this AgreementA Management Entity seeking to amend Annex C to revise existing Specifications or to add a new product type is the “Proposing Management Entity.”
- Fluid, collaborative specification process, revise and create new specifications continuously
 - Move forward aggressively with EU

ENERGY STAR Accomplishments



- 76 specifications in 35 ENERGY STAR product categories
 - OE - six
- 1,400 manufacturers; 400 retailers (20,000+ storefronts)
- 1 billion products purchased by American consumers
- 56% of US consumers recognize the ENERGY STAR
 - 95% of US purchasers would likely buy another
- In 2003 alone, ENERGY STAR:
 - saved > \$9 billion on consumer energy bills
 - reduced GHG emissions equal to removing 18 million cars from the road for 1 year
 - saved enough electricity to power 20 million homes
- Increased awareness of the ENERGY STAR mark
 - In Canada, awareness has risen from a pre-launch baseline of 25% in October 2001 to 40% in September 2003

Vision & Future Priorities



- **Vision: Quickly develop relevant, challenging specifications**
 - Renew EU-EPA Agreement in 2005
 - US & EU must take a leadership role
 - Improve coordination with international stakeholders
 - Refine specifications and test procedures that adhere to guiding principles
 - Finalize office equipment specifications
 - Look beyond OE for new opportunities;
 - Coordinate on power supplies
 - Encourage power management
 - Evaluate active mode opportunity
- **Vision: Modernize and increase program reach and impact**
 - Educate & promote ENERGY STAR to consumers
 - Database / OPS / FAP
 - Streamline program administration

Timeline



- Finalize:
 - Monitors – Awaiting EU adoption
 - Imaging equipment - 2005
 - Computers - 2006
 - Investigate servers as an option
 - Power Supplies - 2005
- EU Next Steps:
 - Formally adopt revised monitors specification
 - Fully assist with revision of imaging equipment and computer specification
 - supply data (metering)
 - technical expertise
 - feedback



Thank You