

アメリカ

Sustainable Purchasing and Ecolabel Use in U.S. Local Governments

ASU Center for Organization
Research and Design
Arizona State University

Sustainable Purchasing
Research Initiative



About Me

Dr. Nicole Darnall
Professor
Management and Public Policy



Visiting
Scholar



Sustainable Purchasing
Research Initiative

安倍 ABE
FELLOWSHIP
PROGRAM



Two Parts...

- 1. Results of a U.S. study on cities' SPPs**
- 2. Results of international study on ecolabel design**

SPP: Sustainable Purchasing Policy

Sustainable Purchasing at U.S. Federal and State Levels

- Federal level
 - Executive orders (3)
 - Sustainability = criteria within federal agencies' purchasing
 - Clinton administration
 - “Greening the Government Through Waste Prevention, Recycling and Federal Acquisition”
 - Obama administration - expansion
 - Reduce greenhouse gas emissions
 - Stimulate demand for sustainable products
 - No enforcement mechanism
 - Policy likely to change under Trump administration
- State Level – some states endorse it – California

A low-angle, upward-looking photograph of several modern skyscrapers with glass facades, reaching towards a blue sky with light clouds. The perspective creates a sense of height and urban density. The bottom of the image is overlaid with a green geometric graphic.

Cities as Innovators

380 U.S. mayors pledged to meet goals of Paris Climate Agreement

- 1. Do U.S. cities that adopt a SPP differ from nonadopters?**
- 2. What factors are associated with SPP implementation success?**



U.S. Project Scope

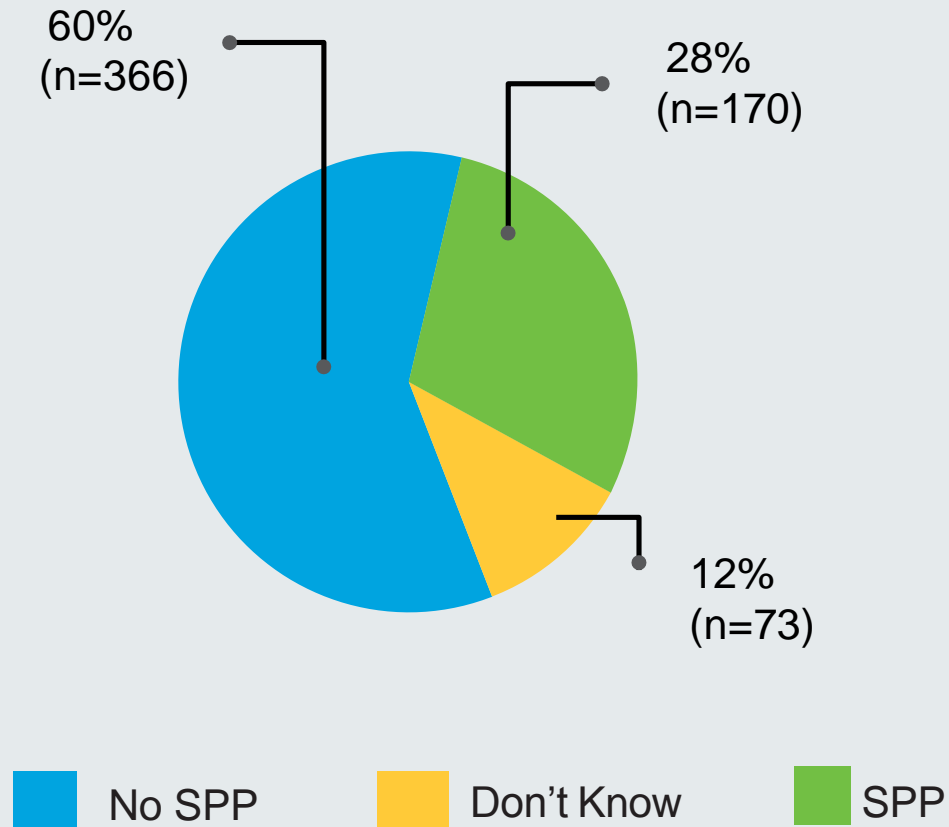
- Sample of 791 U.S. cities of $\geq 25,000$ residents
 - Representative based on location, size and income
- Surveyed department directors
 - Environment, finance and public works
- Focused specifically on environment
- Data collection completed April 2017
 - 58.0% cities (459)
 - 33.8% individuals (616)



Japan Project Scope

- All 860 Japanese municipalities of $\geq 25,000$ residents
- Surveying department directors
 - Environment, finance and public works
- Focusing specifically on environment
- Data collection will be completed January 2018
 - > 83.0% municipalities (714)
 - > 50.0% individuals (430)
- Return November 2018 – January 2019

U.S. SPP Adoption



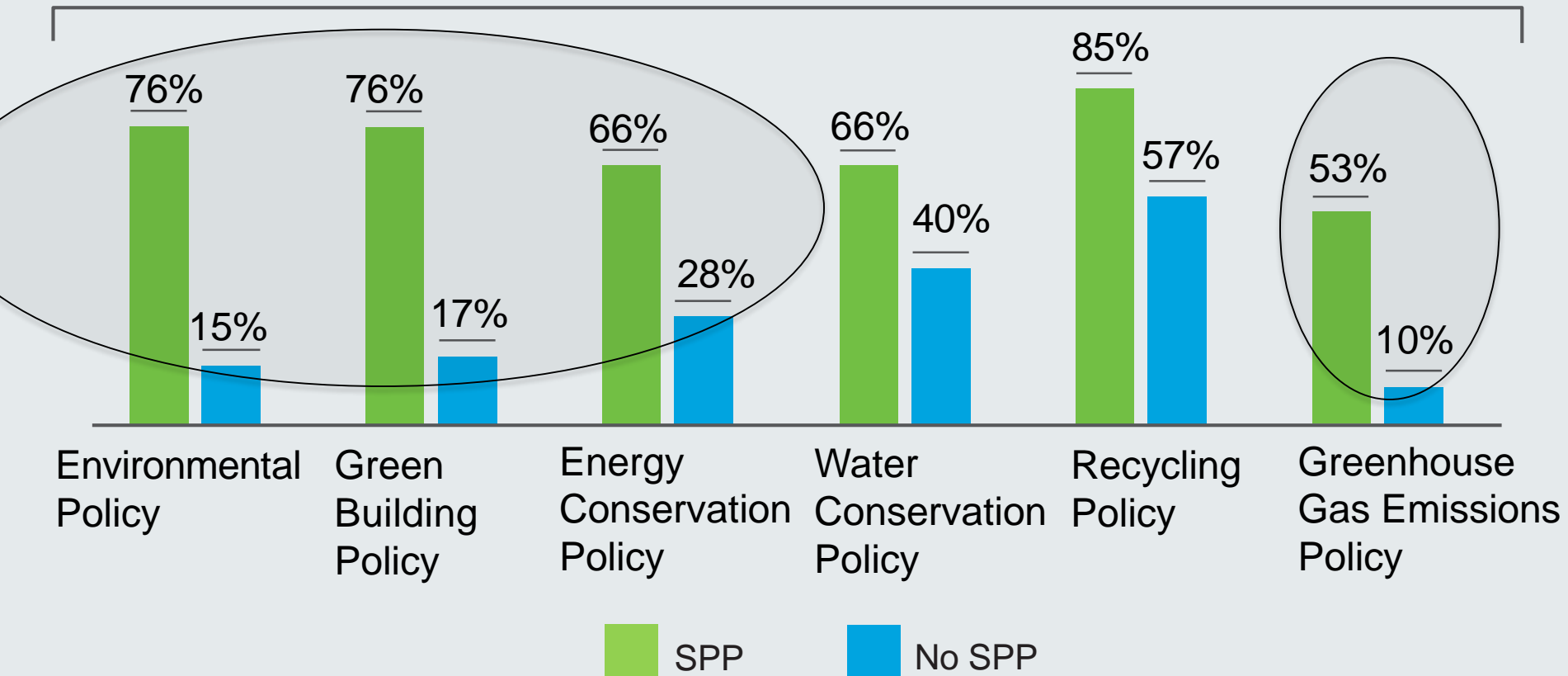


1. Do U.S. cities that adopt a SPP differ from nonadopters?

- A. Citywide complementary policies and practices
- B. Information access
- C. Leadership and resources
- D. Vendor roles

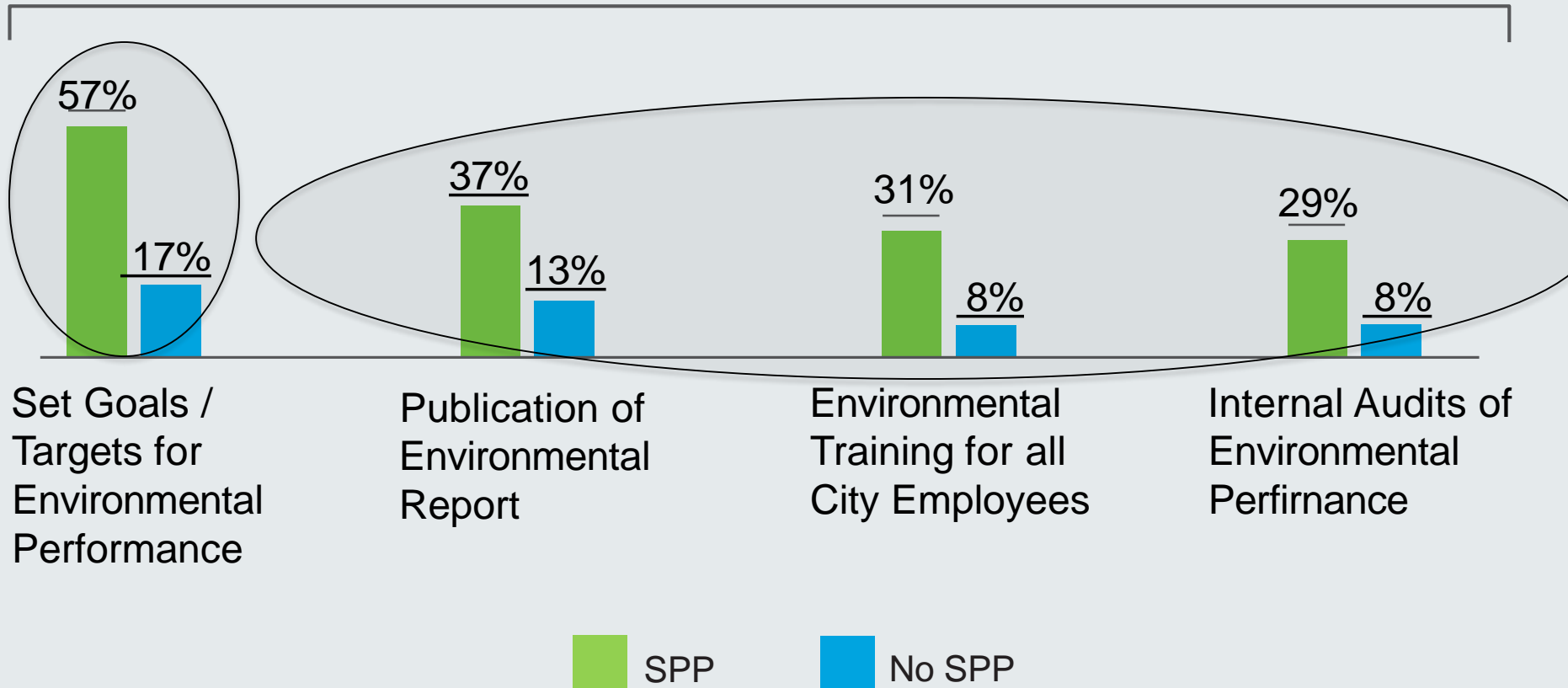
A. Complementary Policies

Citywide Implementation of Complementary Environmental Policies



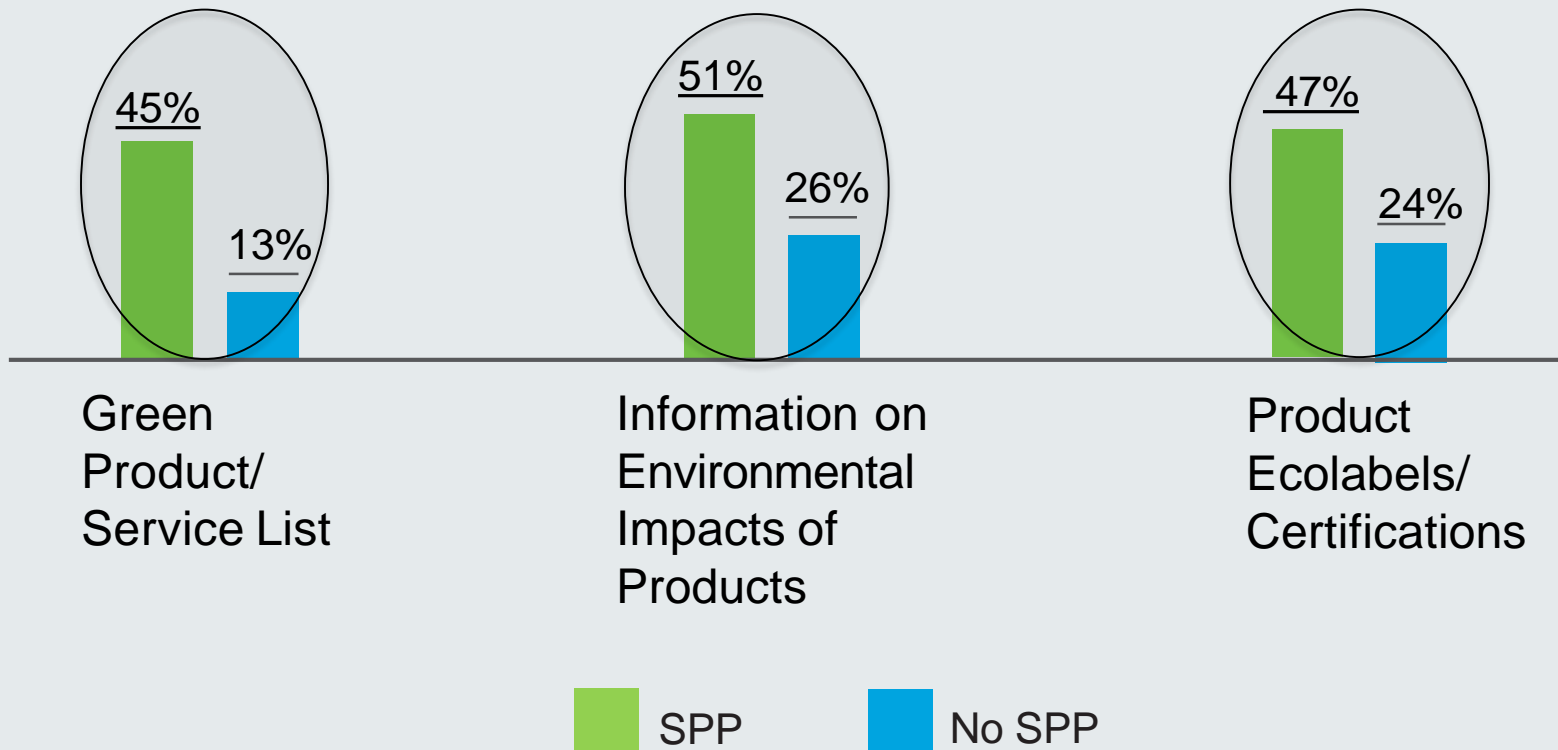
A. Complementary Practices

Citywide Implementation of Environmental Practices



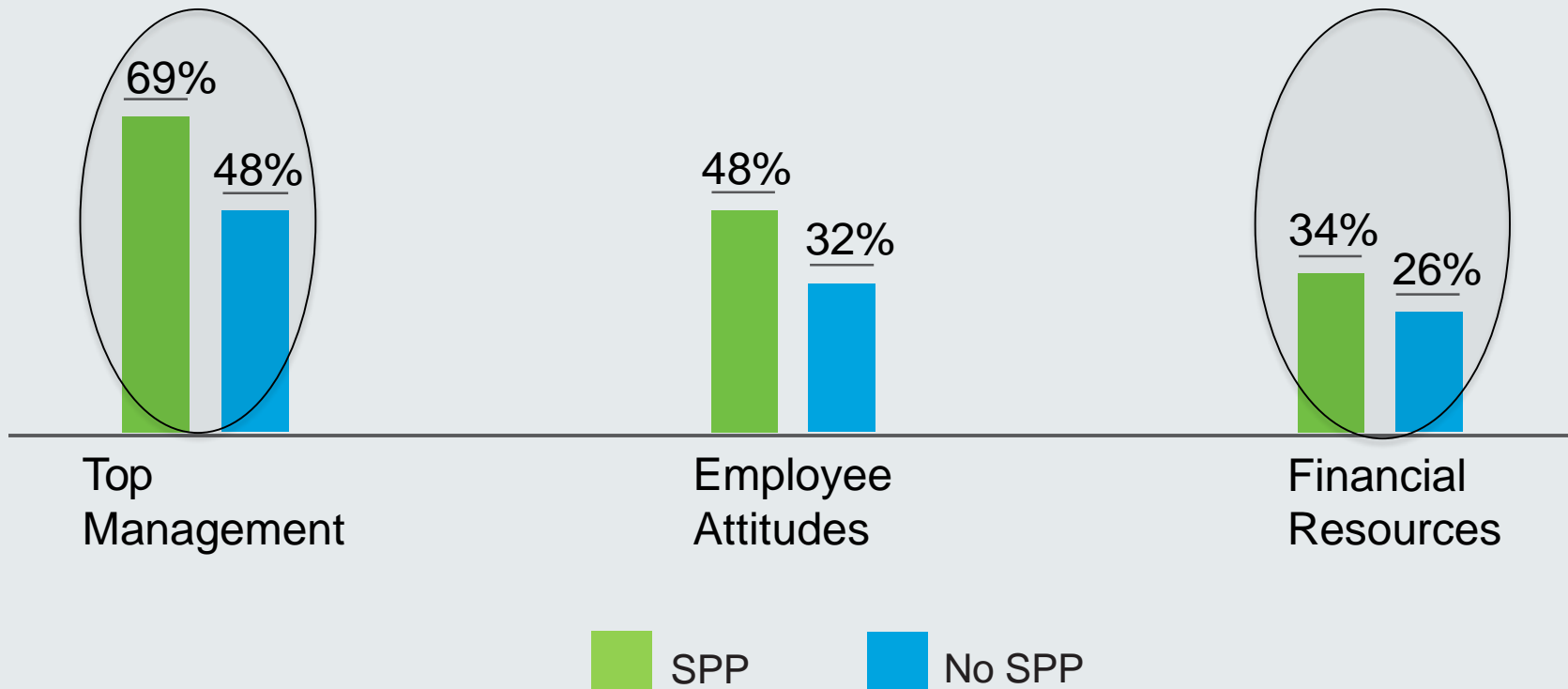
B. Information Access

Information Sources Available to Departments When Making Purchasing Decisions



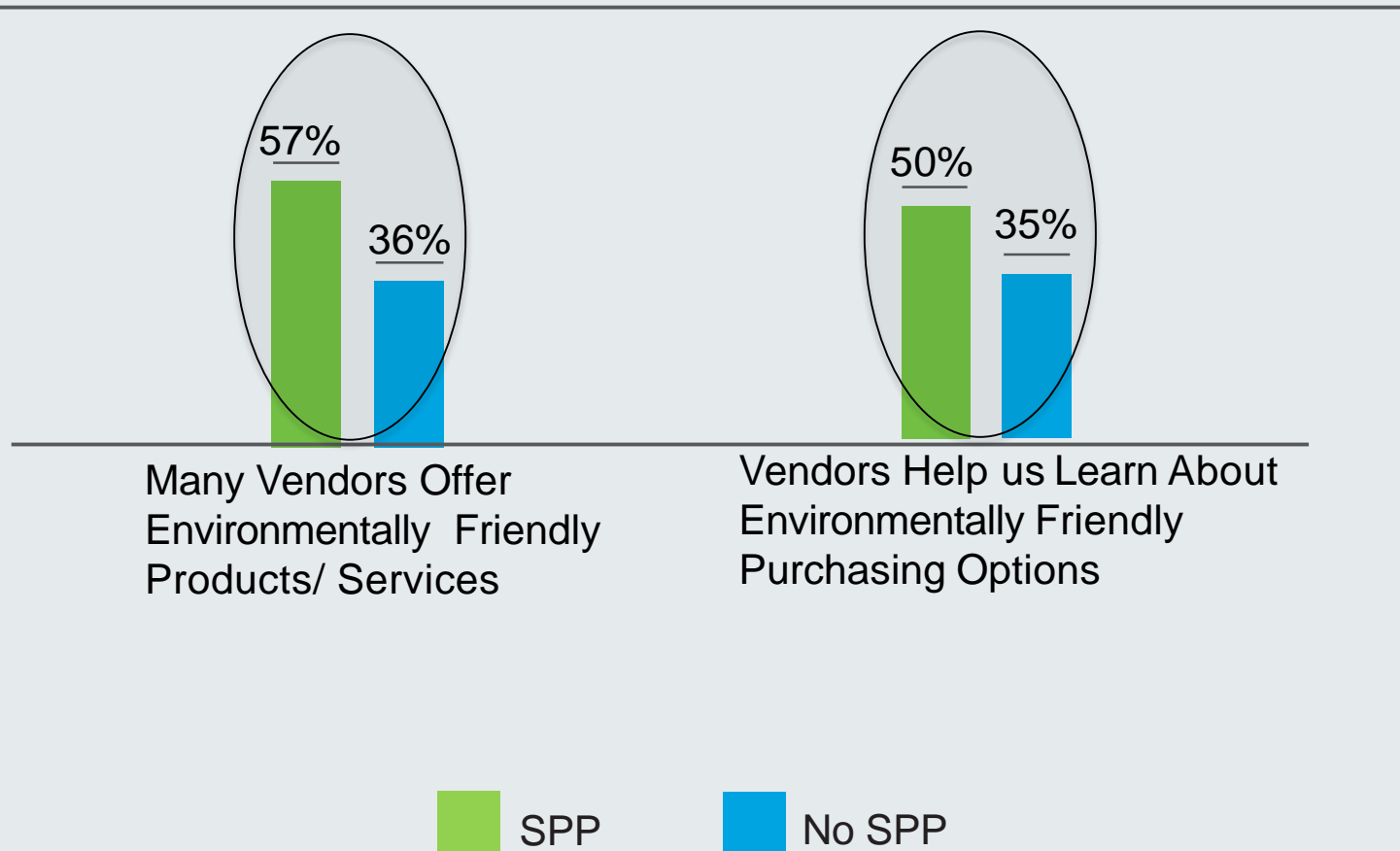
C. Leadership

Facilitators of Departments' Ability to Implement Sustainable Purchasing



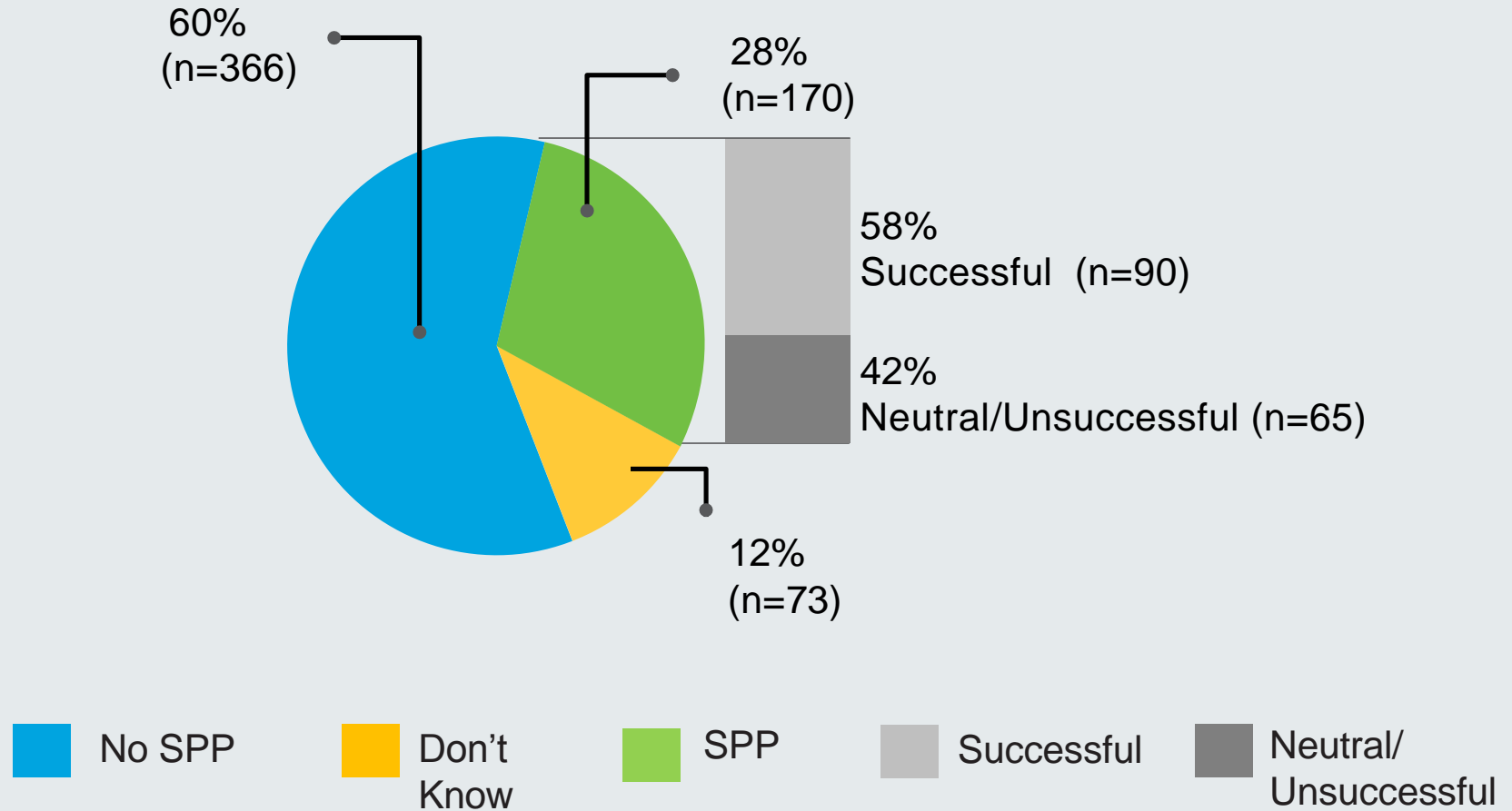
D. Vendors

Vendor Roles



**But adopting a SPP does not mean
that it will be successful at reducing
environmental impacts...**

U.S. SPP Implementation Success



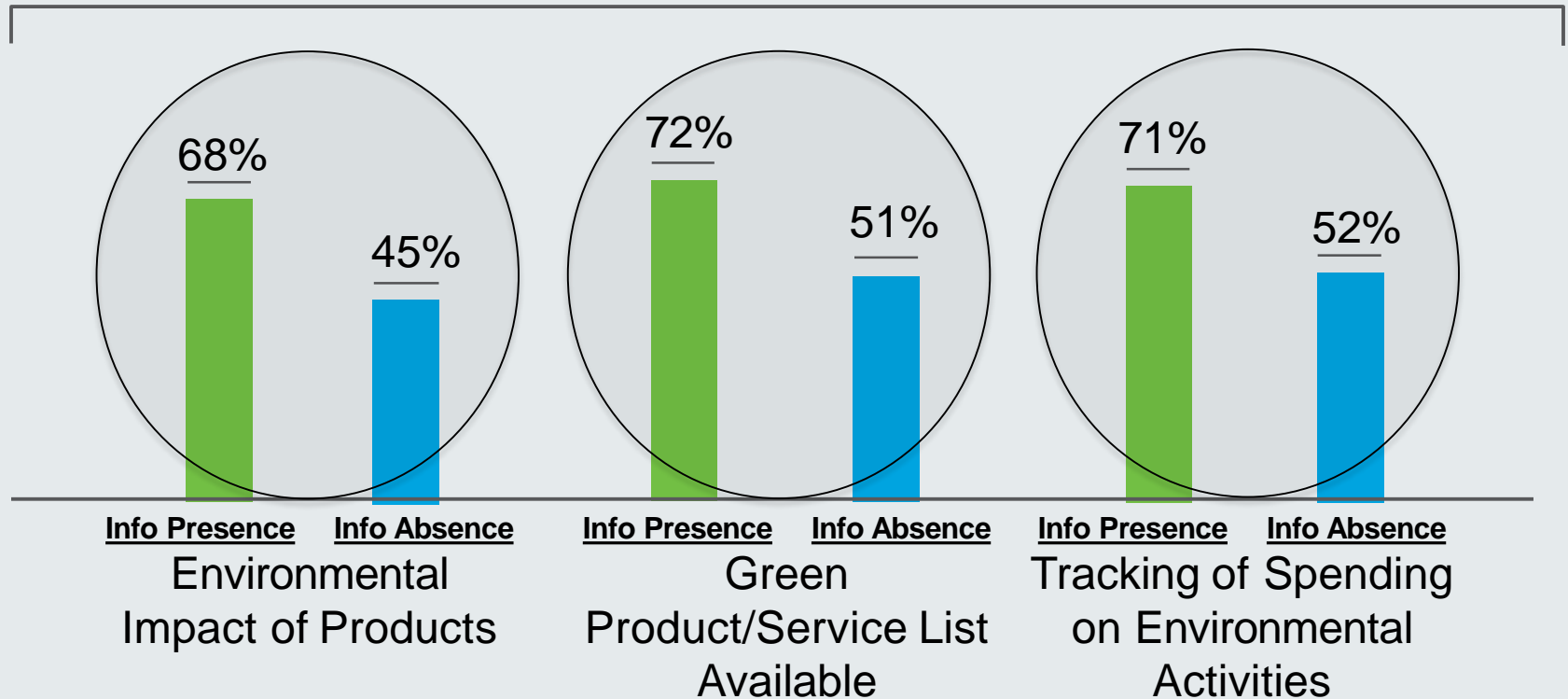


2. What Factors Are Associated With U.S. Cities' Sustainable Purchasing Success?

- A. Citywide complementary policies and practices
- B. Information access
- C. Leadership and resources
- D. Collaborative relationships with vendors
- E. Innovation culture

Information Access

Given Access to Types of Information,
Probability of a City Implementing a Successful SPP



A low-angle, upward-looking photograph of several modern skyscrapers with glass facades. The buildings are dark, and many windows are illuminated from within, creating a grid of warm yellow lights against the blue sky. The perspective makes the buildings appear to converge towards the top of the frame.

Recommendations for Cities to Increase SPP Adoption and Implementation Success

Our 8 Recommendations

1. Build on complementary policies and practices
2. ***Use information about environmentally preferred products***
3. Utilize e-procurement systems that integrate environmental product information
4. Track spending related to sustainable purchases
5. Enhance collaborative vendor relationships
6. Assign accountability to top-level management
7. Foster a culture for innovation
8. Participate in professional networks to share best practices

U.S. Federal Position

- No federal regulation of ecolabels
- Federal Trade Commission regulates deceptive advertising claims
 - False “green” advertising considered #1 area for consumer deception
 - Limited prosecutions
- U.S. Environmental Protection Agency offers some guidance
 - *Guidelines for Environmental Performance Standards and Ecolabels*
 - Only considered a limited number of ecolabels

Ecolabels

- 1990 = ~ 1 dozen
- 2017 = ~ 465
- Different sponsors
 - *Government*
 - *Industry Associations*
 - *Independent Organizations*
 - Standards setting organizations
 - Environmental NGOs



PART TWO: Ecolabel design

(Darnall, Ji & Potoski, *Regulation & Governance*, forthcoming)

- Are some ecolabels more credible than others?
 - Is sponsorship a reliable information cue (signal) about the rule structures of ecolabels?
 - International study

Environmental Performance Standards

- ✓ **Specific performance metrics or data**
- ✓ **Performance assessment requirement**
- ✓ **Performance improvement over time**

Monitoring

- ✓ **Third party audit**
- ✓ **Third party certification**

Conformance

- ✓ **Corrective action reports**
- ✓ **Public reporting**

Data

- **Ecolabel Index** (www.ecolabelindex.com)
 - Largest directory of global ecolabels
 - 2015 - contained program design information for 436 ecolabels
 - **Limited sample to ecolabels...**
 - OECD countries
 - Still functioning in 2015
 - Online contact information
- 352 ecolabels
- **Only 1/4 had complete data**
 - 265 incomplete

Data

- For ecolabels with incomplete information...
 - Survey program managers about ecolabel rules
 - 10 questions
 - Environmental standards
 - Monitoring requirements
 - Conformance requirements
 - 102 responses (38% response rate)
- Combined data for 189 ecolabels
 - Complete data for 54% of ecolabels

Environmental Performance Standards

- ✓ Specific performance metrics or data
- ✓ Performance assessment requirement
- ✓ Performance improvement over time

Industry > Indep.
Indep., Govt. > Industry
Indep. > Industry

Monitoring

- ✓ Third party audit
- ✓ Third party certification

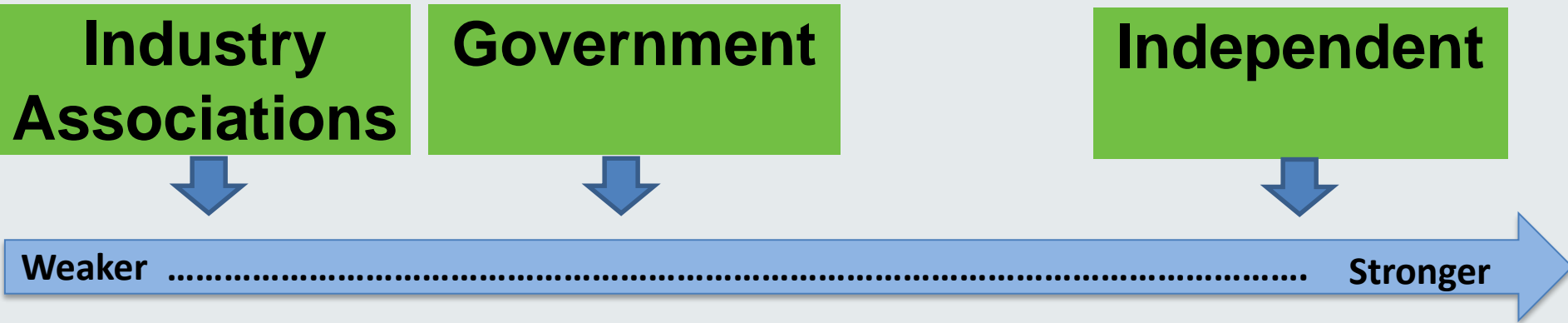
Indep., Govt. > Industry
Indep. > Govt., Industry

Conformance

- ✓ Corrective action reports
- ✓ Public reporting

Indep. > Govt.
No differences

Rule Structures



**Governments need information access
for SPPs to be successful**

Ecolabels can assist

Sponsorship = important information cue
➔ *Independent ecolabels are more robust*

Additional Information & Articles

- U.S. cities' SPP adoption
- Updates on Japan SPP study
- Ecolabel studies

spa.asu.edu/SPRI

Questions?

Nicole Darnall

ndarnall@asu.edu



Arizona State University

Sustainable Purchasing
Research Initiative

Ecolabel Rules/Design Features	<u>Ecolabel Sponsor:</u>			Statistical Differences between: (*** p<.01; ** p<.05; *p<.10)		
	Govt (n=31)	Indep (n=117)	Industry (n=41)	Govt/ Indep	Govt / Industry	Indep/ Industry
Environmental Requirement						
Specific metrics or performance data required	90%	79%	93%	--	--	*
Conducts assessments of environmental/social impacts	71%	70%	46%	--	**	***
Requires environmental/social performance improvements over time	61%	62%	44%	--	--	**
Monitoring Requirement						
Third party audit required	68%	64%	49%	--	*	**
Third party certification required	55%	68%	54%	**	--	***
Conformance Requirement						
Corrective action reports required	65%	80%	68%	*	--	--
Assessment/audit reports publicly	36%	38%	24%	--	--	--

Ecolabel Rules/Design Features	<u>Ecolabel Sponsor:</u>			<u>Statistical Differences between:</u> (*** p<.01; ** p<.05; *p<.10)		
	Govt (n=31)	Indep (n=117)	Industry (n=41)	Govt/ Indep	Govt / Industry	Indep/ Industry
Environmental Requirement						
Specific metrics or performance data required	90%	79%	93%	--	--	**
Conducts assessments of environmental/social impacts	71%	70%	46%	--	**	***
Requires environmental/social performance improvements over time	61%	62%	44%	--	--	**
Monitoring Requirement						
Third party audit required	68%	64%	49%	--	*	**
Third party certification required	55%	68%	54%	*	--	**
Conformance Requirement						
Corrective action reports required	65%	80%	68%	*	--	--
Assessment/audit reports publicly	36%	38%	24%	--	--	--