

**Introduction to  
Endorsement Labels  
(White Swan,  
Blue Angel,  
EU Flower  
and others)**

**Buy Quiet 2011**

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# OUTLINE

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- Introduction to “Endorsement Labels”
- Criteria included in Endorsement Labels
- Endorsement Label programs
- Types of Products included
- Types of noise criteria
- Benefits
- Problems or limitations
- Recommendations

# Introduction – Endorsement Labels

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- **Endorsement labels** or voluntary environmental labels, “**eco-labels**”, are intended to signify “environmental acceptability” of a product
- In order to obtain the endorsement a product must meet several criteria that have been established for specific product types

# Criteria included in Endorsement Labels

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- The criteria may include:
  - power consumption,
  - hazardous substances,
  - batteries,
  - safety,
  - consumable materials,
  - packaging materials,
  - environmental design,
  - electromagnetic emissions,
  - chemical emissions
  - product acoustic noise emissions
- They require 100% compliance with all criteria

## Endorsement Label Programs

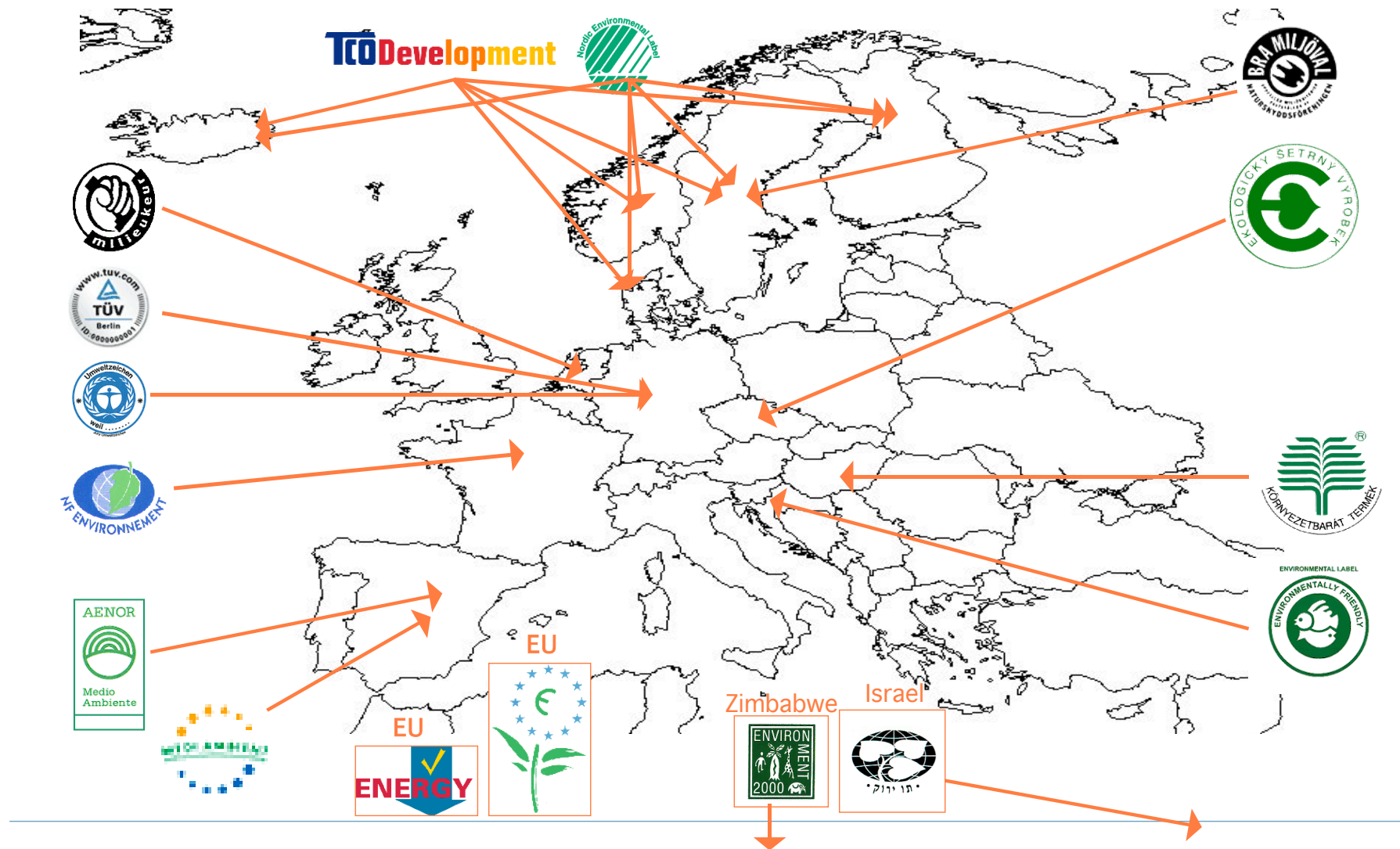
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- More than twenty eco-label or endorsement label programs exist
- Next three slides courtesy of Hans Wendschlag, HP

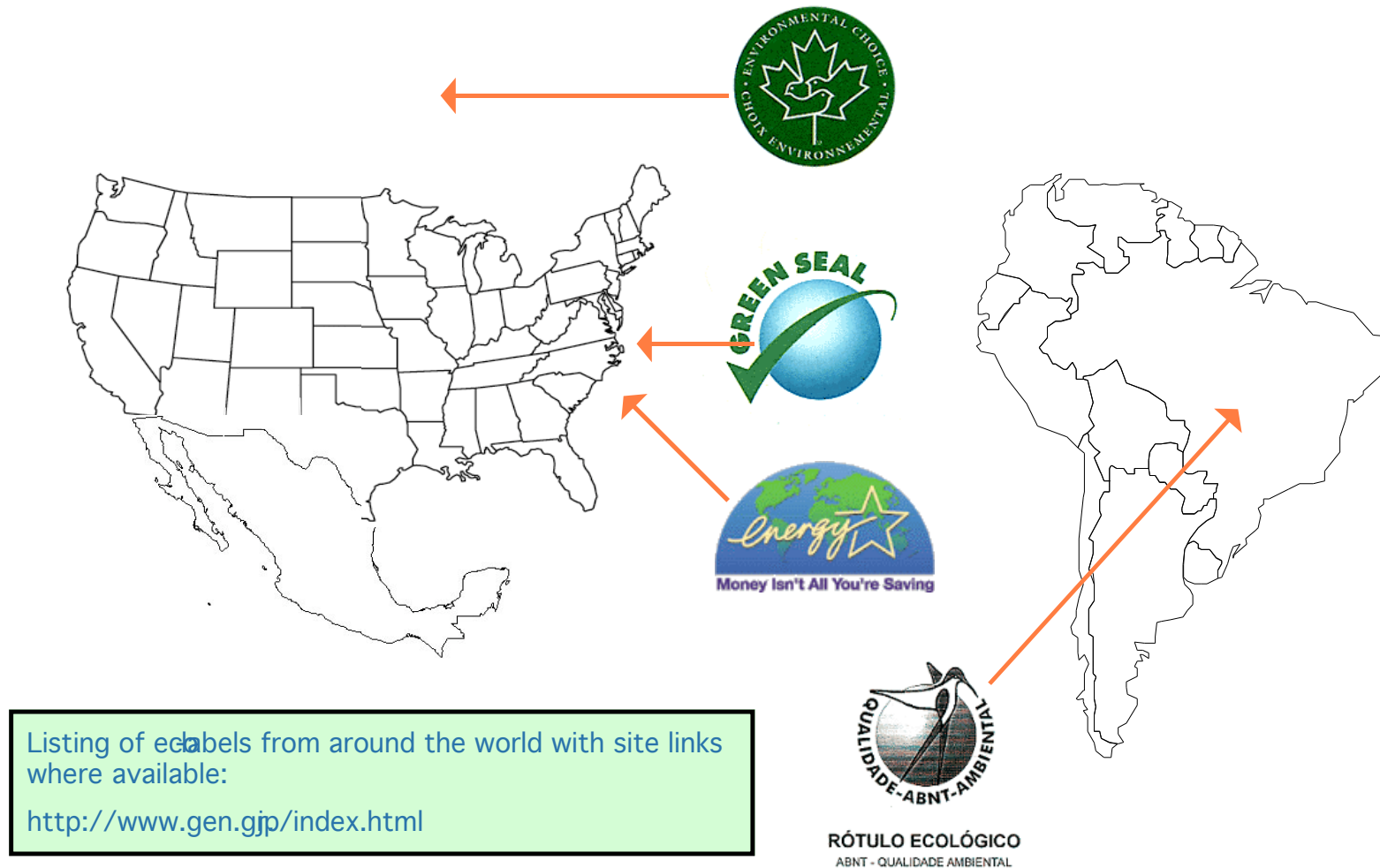
# Asia Pacific Japan- all known eco-labels



# EMEA – all known ecolabels



# Americas– all known ecolabels





## Types of Products include in Endorsement Labels

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- Numerous Product Groups
- For example, Nordic Swan has 60 product groups
- Some product groups include acoustic noise criteria
  - sound level criteria and/or
  - reporting of noise emission data

# Product Groups in Nordic Swan Eco-Label 1/2

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- Alternative dry cleaning
- Audiovisual equipment
- Base module
- Batteries, Primary
- Biofuel Pellets
- Candles
- Car and boat care products
- Chemical building products
- Chemical List
- Chemical module
- Cleaning agents for use in the food industry
- Cleaning Products
- Cleaning services
- Closed Toilet Systems
- Coffee filters
- Compost bins
- Compressors
- **Computers**
- Copy and printing paper
- Cosmetic products
- De-icers
- DID-list
- Dishwasher detergents
- Dishwasher detergents for professional use
- **Dishwashers**
- Disposable bags, tubes and accessories for health care
- Durable wood Alternative to conventionally impregnated wood
- Fabric cleaning products containing microfibres
- Filmforming floor care products
- Floor coverings

# Product Groups in Nordic Swan Eco-Label 2/2

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- Fuel
- Furniture and fitments
- Grease-proof Paper
- Hand Dishwash Detergents
- Heat pumps
- Hotels and youth hostels
- Imaging equipment
- Indoor paints and varnishes
- Industrial cleaning and degreasing agents
- Laundries/ Textile Services
- Laundry detergents and stain removers
- Laundry detergents for professional use
- Lubricants
- Machines for parks and gardens
- Outdoor furniture and playground equipment
- Panels for the building, decorating and furniture industry
- Paper envelopes
- Photographic developments services
- Printing Companies
- Rechargeable batteries and battery chargers
- Refrigerators and freezers
- Restaurants
- Sanitary Products
- Small houses, apartment buildings and pre-school buildings
- Solid Biofuel Boilers
- Stoves
- Supermarket Grocery Stores
- Textiles, skins and leather
- Tissue paper
- Toner cartridges
- Toys
- Washing machines
- Vehicle Tyres
- Vehicle wash installations
- Windows and exterior doors
- Writing Instruments

# Benefits of Eco-Labels

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- Quality labels or approvals for “ecologically” good products
- Goal to signify “environmental acceptability” of a product
- If established properly, such eco-labels may signify “quiet products” or “acceptable” products.
- For many labels there is considerable success, e.g., USA “Energy Star” program and German Blue Angel mark for many products.
- Assumption is that no additional information is necessary for “labeled products”.
  - However, some require reporting of noise information

# Problems with Eco-Labels

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Problems with eco-labels as a source of product noise information:

- Only a few product types covered
- However, for int'l manufacturers there are too many programs (!)
- They require 100% compliance with all criteria
  - Exclusive: for some only 25% can meet each criteria implying only 5% of products can meet all criteria.
- Costly
- Inconsistent criteria (over 20 known programs world-wide for IT products) –
- Criteria fails to recognize that acceptable noise output of products depends on environment, e.g., PCs in open office vs. quiet offices
- May not provide actual noise values
- Non standard metrics and operating modes
  - Requires additional testing of additional modes
  - Does not represent “typical operation”
  - Eco-Label organizations have not participated in standards setting process

## Problems with Eco-Labels (Cont.)

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### Proliferation of product operating conditions and measurements during test

- Printer examples:
  - Different speed requirements
  - Different operating cycles
  - Different metrics: sound power vs. impulsive sound power
  - Different nomenclature: bel (B) vs. dB
  - Accredited test lab requirements
- PC Examples:
  - Different operating modes
    - (HDD vs CD)
    - CPU operation
  - Inconsistent application of ISO 9296
  - Different  $L_{wA}$  nomenclature: bel (B) vs. dB

# IT Eco-Declarations – ECMA-370

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- To provide a uniform method of reporting product environmental attributes to customers and
- To overcome the deficiencies of Eco-labels, two documents were prepared in the late 1990s:
- IT Foretagen “IT Eco-Declaration”
  - More than 2000 IT Eco-declarations have been issued.
- ECMA TR/70 “Product-related environmental attributes”
  
- In 2005 IT Foretagen and Ecma Int. began a project to harmonize their separate documents
- New ECMA-370 standard published June 2006, 4th edition published in June 2009

# Recommendations

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- Endorsement test methods should follow International test procedures for products with defined modes
  - If Endorsement Label Organizations believe that standardized test methods are inappropriate, participate in international standards process
- Harmonize award criteria internationally
- ECO-label criteria for products should consider environment in which product will be used
  - *“Decreasing a PC’s sound power level below the environmentally based acoustic target does not provide any perceivable end user benefits.”*
    - Dunstan, Gabel and Laney [NOISE-CON 2003]



# Thank you – Merci Beaucoup

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- DISCUSSION
  - QUESTIONS
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