Small Fruit Berry Crops:

Production and marketing overview

Mark Gaskell, Ph.D.
University of California Cooperative Extension
Small fruit Berry Crops

- Blueberry
  *(Les myrtilles)*

- Blackberry
  *(Les mûres)*

- Raspberry
  *(Les framboises)*
U.S. Sales of Small Fruits - 2008

- Strawberry: 57.2%
- Blueberry: 24.7%
- Raspberry: 11.1%
- Blackberry: 5.5%
- Other: 1.4%
Consumer demand for small fruits - US

Subcategory Contribution to Total Berries
2004 vs 2008

<table>
<thead>
<tr>
<th>Subcategory</th>
<th>2004</th>
<th>2008</th>
</tr>
</thead>
<tbody>
<tr>
<td>Blackberries</td>
<td>4.0%</td>
<td>5.5%</td>
</tr>
<tr>
<td>Blueberries</td>
<td>20.9%</td>
<td>24.7%</td>
</tr>
<tr>
<td>Currants</td>
<td>0.1%</td>
<td>0.0%</td>
</tr>
<tr>
<td>Other Berries</td>
<td>1.7%</td>
<td>1.4%</td>
</tr>
<tr>
<td>Raspberries</td>
<td>9.6%</td>
<td>11.1%</td>
</tr>
<tr>
<td>Strawberries</td>
<td>63.8%</td>
<td>57.2%</td>
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source: FreshFacts- www.perishablesgroup.com
<table>
<thead>
<tr>
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<td>394.1 (60%)</td>
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<td>117.1 (18.8%)</td>
<td>124.2 (18.7%)</td>
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<td>25.9 (4.1%)</td>
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### United Kingdom Small Fruit Market

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January 2012 UK supermarket chains reporting weekly sales for blackberries up 98% and blueberries up 16% over same time prior year.
Small fruit berry crops

• *Small perennial shrubs or vines*
Small fruit berry crops

- Small perennial shrubs or vines.
- Share many production and marketing characteristics with strawberry.
- Raspberries, blueberries, and blackberries increasing importance over past 10-15 years.
- Historically cultivated in temperate cold areas. now also into subtropical areas of US, Spain, Morocco and highland tropics in Mexico and Central America
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Opportunities for small fruit crops

- Out of season production > October to May / June > investigate other mid season markets?

Create jobs in rural areas – high labor requirement.

Well adapted to many mild, coastal areas for off-season production
Opportunities for berry crops

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• Well adapted to many mild, coastal areas for off-season production
• Best opportunities are for fresh market emphasis.
> best utilizes geographic, climate advantages

• Use processing market for volume of product that cannot be marketed fresh.
Small fruit berry crops – need for research

- New varieties constantly with improved productivity and quality.  
  > need to be evaluated in specific environments especially with regard to the market

- Need for continuing research on variety development, cultural practices, pests / disease management.

- Use of field tunnels improves yield / quality during off season.  
  > not always justified
Opportunities for berry crops

- Other small fruit crops can also utilize infrastructure and experience from existing strawberry industry.

- Important for employment and rural economies.

- Especially important for unemployed women.

- Additional options:
  - summer and autumn exports,
  - domestic sales, tourism
  - organic (biologique) production
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Organic Berry Production

• Growing demand in EU and concentrated effort among EU supermarkets
  > more specialized market with premium prices

• Higher costs of production and more demanding management
  > specialized skills and special research needs

• Important to have close connection with production and specialized post harvest handling and marketing.
Growing market in EU supplied by Chile, Argentina, Mexico, South Africa, Spain + recently Morocco.

Popular fruits in many areas of Europe where production limited to June and July.

Mild climates and established market channels offer many advantages for Portugal.
2010 France – wholesale price in domestic market
Blueberry situation
Blueberry nutritional value

BLUEBERRIES
A Handful of Health

Plump, juicy, and sweet, with vibrant colors ranging from deep purple-blue to blue-black and highlighted by a silvery sheen called a bloom, blueberries are one of nature’s great treasures. Though miniature in size, they are also proof that, when it comes to health benefits, good things really do come in small packages.

BLUEBERRIES ARE...

LOW IN FAT.
A one-cup serving contains only 80 calories and virtually no fat.

FULL OF DIETARY FIBER.
A handful of blueberries helps satisfy your daily fiber intake. Fiber helps keep the body regular, the heart healthy, and cholesterol in check.

FULL OF PHYTONUTRIENTS.
Research suggests that the phenolics in blueberries, called polyphenols, have antioxidant and anti-inflammatory properties that may help keep the inflammatory process associated with chronic conditions such as cardiovascular disease, cancer, and other age-related diseases.

PACKED WITH VITAMIN C.
One serving delivers almost 25% of your daily requirement of vitamin C. Vitamin C aids collagen formation and helps maintain healthy gums and capillaries and a healthy immune system.

AN EXCELLENT SOURCE OF MANGANESE.
Manganese plays an important role in bone development and in converting proteins, carbohydrates, and fats into energy.
NORTH AMERICAN BLUEBERRY CONSUMPTION

With blueberry production increasing to match rising levels of consumption, it's clear that more Americans are discovering just how good these Little Blue Dynamos are.

<table>
<thead>
<tr>
<th>Year</th>
<th>Total Consumption (in million lbs.)</th>
</tr>
</thead>
<tbody>
<tr>
<td>1995</td>
<td>283</td>
</tr>
<tr>
<td>2000</td>
<td>349</td>
</tr>
<tr>
<td>2005</td>
<td>414</td>
</tr>
<tr>
<td>2010</td>
<td>749</td>
</tr>
<tr>
<td>2011</td>
<td>853</td>
</tr>
</tbody>
</table>

Per Capita Consumption:
- 1995: 15.5 oz.
- 2000: 17.8 oz.
- 2005: 20.2 oz.
- 2010: 34.9 oz.
- 2011: 39.5 oz.
U.S. COUNTERSEASONAL FRESH BLUEBERRY IMPORTS

Source: Honigberg (Sunbelle Mktg) GBC Monterey, CA 2011
Blueberry production and export - Chile
Blueberry production and export - Chile

ARÁNDANO DEL HEMISFERIO SUR: EXPORTACIÓN TOTAL EN TONELADAS

Fuente: MAG / SAG - ASOEX / iQonsulting.
Blueberry production and export – South America

ARÁNDANO DE SUDAMÉRICA: DISTRIBUCIÓN DEL VOLUMEN DE EXPORTACIÓN SEMANAL POR PROVEEDOR.
TEMPORADA 2011/2012

Fuente: SAG - ASOEX / MAG / iQonsulting.
Weekly EU market Chilean blueberry shipping volume by mode of transport – 2011 / 2012 season

Source: ARANDANOS - MERCADO INTERNACIONAL Y EXPECTATIVAS PARA LA OFERTA DE CHILE, Quiros Consulting
Weekly EU market Chilean blueberry shipping volume by mode of transport – 2011 / 2012 season

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Off-season blueberry summary

- Argentina and Chile ship ~ 20,000 tonnes to EU.
- Moroccan blueberry acreage increasing + 500 ha planted or planned
  - 1000 ha within a decade
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  - 1000 ha within a decade
Raspberry situation
Blackberry situation
U.S. FRESH BLACKBERRY IMPORTS

Source: USDA

Season (September to August)

Metric Tons (MT)

0 5,000 10,000 15,000 20,000 25,000 30,000 35,000 40,000 45,000

05-06 06-07 07-08 08-09 09-10

MEXICO
GUATEMALA
CHILE
COSTA RICA

Source: Honigberg (Sunbelle Mktg) GBC Monterey, CA 2011
Figure 32 Blackberries wholesale prices at New Covent Garden market (2005-2008) - United Kingdom

Blackberry production in Mexico

- Considerable effort in recent years in improving production and management and breeding new varieties.

- 10,000 ha of blackberries in MX and expect to double in next 10 yrs.

>>> now 80,000 workers involved in berry production and marketing in Mexico.
Off-season blackberry summary

- EU market heavily supplied by Mexico, some starting in Portugal from research underway.

- Blackberry still experimental in Morocco and Spain

- Blackberry production in Morocco promising and will expand based on research and experience in California, Portugal, Spain
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- Blackberry production in Morocco promising and will expand based on research and experience in California, Portugal, Spain.
Overall, Chile and Argentina blueberry to EU = 15,000 > 20,000 tonnes at 8 Euro / kg

= ~ 160 Million Euros for Blueberries to EU
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Figure 30 Raspberries wholesale prices in the New Covent Garden market (2005-2009) - United Kingdom

## Seasonal area planted (ha) to strawberry and raspberry

**Huelva, Spain**

<table>
<thead>
<tr>
<th>Season</th>
<th>Strawberry</th>
<th>Raspberry</th>
</tr>
</thead>
<tbody>
<tr>
<td>2009/10</td>
<td>6.500</td>
<td>910</td>
</tr>
<tr>
<td>2010/11</td>
<td>6.400</td>
<td>943</td>
</tr>
<tr>
<td>2011/12</td>
<td>7.150</td>
<td>1320</td>
</tr>
<tr>
<td>% change</td>
<td>+11.7%</td>
<td>+40.0%</td>
</tr>
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## Seasonal strawberry and raspberry production (tonnes)

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<tr>
<th>Season</th>
<th>Strawberry</th>
<th>Raspberry</th>
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<tr>
<td>2009/10</td>
<td>264.355</td>
<td>8.250</td>
</tr>
<tr>
<td>2010/11</td>
<td>252.250</td>
<td>8.460</td>
</tr>
<tr>
<td>2011/12</td>
<td>280.000</td>
<td>12.091</td>
</tr>
<tr>
<td>% change</td>
<td>+11,0%</td>
<td>+42,9%</td>
</tr>
</tbody>
</table>

Weekly shipping point prices for raspberry - Huelva

Source: Chancellery for Agriculture, Fisheries, and Environment, Spain
<table>
<thead>
<tr>
<th></th>
<th>2011 / 12 Season</th>
<th>variation from average of last 3 seasons</th>
</tr>
</thead>
<tbody>
<tr>
<td>Huelva</td>
<td>11.829,8</td>
<td>+7,75%</td>
</tr>
<tr>
<td>Andalucía</td>
<td>12.205,8</td>
<td>+8,12%</td>
</tr>
<tr>
<td>España</td>
<td>12.824,2</td>
<td>+0,47%</td>
</tr>
</tbody>
</table>

Source: Chancellery for Agriculture, Fisheries, and Environment, Spain
### Value of fresh raspberry exports – Spain (000s Euros)

<table>
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<th>2011 / 12 Season</th>
<th>variation from average of last 3 seasons</th>
</tr>
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<tbody>
<tr>
<td>Huelva</td>
<td>92.583,7</td>
<td>+16.35%</td>
</tr>
<tr>
<td>Andalucía</td>
<td>96.232,1</td>
<td>+16.65%</td>
</tr>
<tr>
<td>España</td>
<td>101.091,5</td>
<td>+9.85%</td>
</tr>
</tbody>
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*Source: Observatorio de Mercados y Precios. Junta de Andalucía*
Destinations of fresh raspberry exports from Huelva

Source: Observatorio de Mercados y Precios. Junta de Andalucía
Off-season raspberry summary

- EU market heavily supplied by Spain, some Portugal.

- Moroccan raspberry acreage increasing > + 1000 ha planted or planned.
  - 2500 ha within a decade
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