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Italy

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Understanding Italian Cheese

Report Categories:

Dairy and Products

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Report Highlights:

Italy prides itself of being one of the world's leading cheese producers, with hundreds of different types of cheeses made from cow, goat, buffalo and sheep milk. There are currently 35 Italian cheeses that have the Protected Designation of Origin (PDO) status under European Union regulations. Italian cheese production has fluctuated in recent years but there has been a general trend upwards and in the long term a relatively strong domestic demand and expansion into export markets such as Russia should keep the Italian cheese market afloat.

General Information:

Overview of the Italian Cheese Market

Italy prides itself of being one of the world's leading cheese producers, with hundreds of different types of cheeses made from cow, goat, buffalo and sheep milk. There are currently 35 Italian cheeses that have the Protected Designation of Origin (PDO) status under European Union regulations. Prior to 1996 when the PDO system came into operation in Italy, many of the cheeses were regulated under a Denominazione di Origine (DO) system. These appellations of origin were recognized in a number of European countries with which Italy had bilateral agreements.

Italian cheese production has fluctuated in recent years but there has been a general trend upwards. From 2002-2004

average annual production was 1.086 million tons. From 2005-2007 annual production increased to 1.153 million tons. Industry sources forecast that from 2008-2013 annual cheese production is expected to increase, with production fluctuating between 1.18million to 1.21million tons. Growth in the short term will be affected by the recession both at home and with regard to export markets. In the long term a relatively strong domestic demand and expansion into export markets such as Russia should keep the Italian cheese market afloat.

| ITALY Cheese Production, Consumption & Trade | | | | | | |
|--|---------|---------|---------|---------|---------|---------|
| | 2008 | 2009 | 2010 | 2011 | 2012 | 2013 |
| Cheese Production, '000 tons | 1,189.4 | 1,204.0 | 1,204.8 | 1,205.3 | 1,198.5 | 1,183.7 |
| Cheese Consumption, '000 tons | 1,394.0 | 1,442.1 | 1,485.6 | 1,528.4 | 1,600.7 | 1,705.3 |
| Cheese Net Trade Balance, '000 tons | -165.4 | -169.7 | -175.2 | -180.6 | -190.8 | -205.3 |

Source: Eurostat, FAO

Classification of Italian Cheeses

According to Italian law (Royal Decree n. 2033 of 1925), following is the definition for cheese in Italy: «cheese is the product obtained from whole or partly skimmed milk, or from cream, after coagulation by acidification or by renneting, also using starter bacteria or kitchen salt».

Cheese is usually considered to be a milk derivative, and is therefore classified on the basis of the following:

- type of milk employed
- fat content
- consistency, depending on moisture content
- technology utilized during the cheese-making process and the temperature of the curd processing
- duration of ripening
- denomination of the product

► Type of Milk used

Cheeses came be made with any of the following:

- cow milk cheeses
- sheep milk cheeses
- buffalo milk cheeses
- goat milk cheeses

For cheeses not produced from cow milk, indication of the species is mandatory.

► Fat Content

Fat content of cheese is expressed on dry matter and are regulated by Italian Law n. 142/1992:

- full-fat cheeses: fat content expressed on dry matter over 35%;

- light (or semi-fat) cheeses: fat content varying between 20 and 35% on dry matter;

- low-fat cheeses: obtained from skimmed milk; fat content below 20% on dry matter.

Many of the Italian PDO cheeses are made from partly skimmed milk and their Product Specification only indicates a minimum fat content on dry matter. Many of these cheeses, originally classified as "semi-fat", nowadays fall into the category of full-fat cheeses. This is due to the decrease of the legal minimum fat content in full-fat cheeses (from 42% to 35%) and the tendency to produce cheeses with higher fat content in order to increase yield and thus the economic benefit.

► Cheese Consistency

Cheese consistency depends on moisture content, and Italian cheeses are classified as follows:

- Soft cheeses: moisture content of over 45%

- Semi-hard cheeses: moisture content varying between 35 and 45%

- Hard cheeses: moisture content below 35%

Generally, moisture content for cheeses is not legally defined, and only in a few cases the Product Specification of the PDO cheeses require a minimum moisture content. Cheese consistency depends not only on moisture, but also on other parameters, such as fat content and the duration of ripening process.

► Cheese Processing Technology

The cheese processing technology and the temperature at which the curd is cooked results in the following classifications:

- Raw cheeses: obtained without applying any heat-treatment to the curd after coagulation

- Semi-cooked cheeses: curd is cooked at temperatures up to 48°C

- Cooked cheeses: curd is cooked at temperatures over 48°C

- "Pasta Filata" (string cheeses): characterized by a treatment of the curd with water at 70-90°C
- *Molded (or "Blue") cheeses:* obtained from milk intentionally inoculated with mold spores which, growing inside the cheese body, contribute to ripening through specific enzymatic activities

► Cheese Aging/Ripening Duration

Aging is determined by the amount of time the cheese is allowed to rest from the time it is produced. It can range anywhere from fresh that can be consumed immediately to aged that must rest in proper storages for long periods, before it is ready for consumption. The aging/ripening of cheeses is classified as follows:

- Fresh cheeses: no ripening occurs; cheeses with no rind nor superficial microflora, which must be consumed within few days after production
- Short-ripened cheeses: ripening period up to 30 days
- Medium-ripened cheeses: ripening period up to 6 months
- Long-ripened cheeses: ripened over 6 months

Types of Italian Cheese Denominations

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PDO - Protected Denomination of Origin cheeses: As defined by Italian Law art. 2. L.10.4.54 n. 125 - "cheeses produced in well defined geographical areas, employing local, loyal and constant practices, which derive their distinctive characteristics principally from the particular conditions of the production environment."

At present, this type of denomination is regulated and protected at the European Community level (Council Regulation (EC) N. 510/2006). (See Annex 1 for a complete list of Italian PDO cheeses).

PGI - Cheeses with Protected Geographical Indication: As defined by Italian Law *Com. I*, art. 2. L. 10.4.54 n. 125) - "cheeses produced on the national territory, employing loyal and constant practices, which derive their distinctive characteristics from peculiar characteristics of the raw materials and of the processing technology".

Also this type of denomination is regulated and protected at the European Community level (Council Regulation (EC) N. 510/2006). Presently there are no Italian cheeses registered at the EU level with this type of denomination.

GTS - "Guaranteed Traditional Specialty" cheeses: As defined by EU Council Regulation (EC) N. 509/2006 - "cheeses produced according to a detailed traditional processing technology, but without any link to existing geographical areas, therefore allowing these cheeses to be produced throughout the national territory.

Only one cheese with this type of de nomination is produced in Italy – Mozzarella.

Traditional regional cheeses: In Italy there are more than 450 'traditional regional' cheeses.

The following table indicates for each cheese the year of PDO registration, the type of milk used and the approximate area within which the regulations permit it to be produced.

List of Italian PDO Cheeses

| Name and styles | PDO | Milk | Regions | Production zone Provinces |
|---|------|--|---------------------------------|--|
| Asiago | | | Veneto | Padua, Treviso (part), Vicenza |
| Asiago d'allevo "mezzano" Asiago d'allevo "vecchio" Asiago pressato | 1996 | Cow | Trentino-Alto Adige/Südtirol | (part) <u>Trento</u> (part) |
| Bitto | 1996 | Cow (80%) Goat (20%) | <u>Lombardy</u> | Bergamo, Sondrio |
| Bra dura tenera di Alpeggio | 1996 | Cow | <u>Piedmont</u> | Cuneo, Turin |
| <u>ur rupeggio</u> | | | <u>Calabria</u> | Crotone, Catanzaro, Cosenza |
| Caciocavallo Silano | 1996 | Cow | <u>Campania</u> | Avellino, Benevento, Caserta, Naples (Entire territory) |
| | | | Molise Puglia Basilicata | Bari, <u>Taranto, Brindisi</u> <u>Matera, Potenza</u> |
| Canestrato Pugliese | 1996 | Sheep | Puglia | Province of Foggia |
| Casatella Trevigiana | 2008 | Cow | Veneto | <u>Treviso</u> |
| Casciotta d'Urbino | 1996 | Sheep (70%– 80%) Cow (20%–30%) | Marche | Province of <u>Pesaro and Urbino</u> |
| <u>Castelmagno</u> | 1996 | Cow Sheep and/or Goat (optionally a little) | Piedmont | Cuneo |
| Fiore Sardo | 1996 | Sheep | <u>Sardinia</u> | <u>Cagliari, Nuoro, Oristano,</u> <u>Sassari</u> |
| <u>Fontina</u> | 1996 | Cow | Aosta Valley | (Entire territory) |
| Formai de Mut dell'Alta Valle Brembana | 1996 | Cow | Lombardy | Bergamo |
| | | | Piedmont | Novara, Vercelli, |
| Gorgonzola | 1996 | Cow | Lombardy | Bergamo, <u>Brescia, Como</u> , <u>Cremona, Lodi, Milan, Pavia</u> Lodi, Bergamo, Brescia, |
| | | | Lombardy | Como, Cremona, Mantova (to the north of the Po), Milan, Pavia, Sondrio, Lecco, Varese |
| | | | Piedmont | <u>Alessandria, Asti,</u> Cuneo, Novara, Turin, Vercelli |
| Grana Padano | 1996 | Cow | Trentino-Alto Adige/Südtirol | Trento |
| | | | Veneto | Padua, <u>Rovigo</u> , Treviso, <u>Venice</u> , <u>Verona</u> , Vicenza |
| | | | Emilia-Romagna | Bologna (east of the Reno), Ferrara, Forlì-Cesena, Piacenza, Ravenna, Rimini |

| | | | Friuli-Venezia Giuli | a Udine, Pordenone, Gorizia, |
|------------------------------|----------|--|---------------------------------|---|
| <u>Montasio</u> | 1996 | Cow | Veneto | <u>Belluno,</u> Treviso, Padua, |
| Monte Veronese | 1996 | Cow | Veneto | Venice Verona |
| Mozzarella di Bufala Campana | 1996 | Buffalo | Campania | Caserta, <u>Salerno</u> , Naples, Benevento, |
| | | | <u>Lazio</u> | Frosinone, Latina, Rome |
| | 1006 | Sheep (60%– | D' 1 | D : CC |
| Murazzano | 1986 | 100%) Cow (0%–40%) | Piedmont | Province of Cuneo |
| Parmigiano-Reggiano | 1996 | Cow | Emilia-Romagna | Modena, Parma, Reggio Emilia, Bologna (west of the Reno) |
| Descripe di Biliana | 2007 | Cl | Lombardy | Mantova (south of the Po) |
| Pecorino di Filiano | 2007 | Sheep | Basilicata Lazio | Potenza Rome |
| D : D | 1006 | C1 | Tuscany | Grosseto |
| Pecorino Romano | 1996 | Sheep | Sardinia | Cagliari, Nuoro, Oristano, Sassari |
| Pecorino Sardo | 1996 | Sheep | Sardinia | Cagliari, Nuoro, Oristano, |
| Pecorino Siciliano | 1996 | Sheep | Sicily | Sassari (Entire territory) |
| recomo Siemano | 1770 | Sheep | <u>Sicily</u> | Arezzo, Pisa, Massa Carrara, |
| Pecorino Toscano | 1996 | Sheep | Tuscany | Livorno, Grosseto, Firenze, Prato, Lucca, Pistoia, Siena |
| | | | Lombardy | Bergamo, Brescia, Cremona, Mantova, Milan |
| Provolone Valpadana | 1996 | Cow | Veneto | Padua, Rovigo, Verona, Vicenza |
| | | | Emilia-Romagna | Piacenza |
| | | | Trentino-Alto Adige/Südtirol | Trento |
| Quartirolo Lombardo | 1996 | Cow | Lombardy | Bergamo, Brescia, Como, Cremona, Lodi, Milan, Pavia, |
| Ragusano | 1996 | Cow | Sicily | Varese Ragusa, Syracuse |
| <u>Raschera</u> | 1996 | Cow Sheep and/or Goat (optionally a little) | Piedmont | Cuneo |
| Ricotta Romana | 2005 | a nuic) | <u>Lazio</u> | (Entire territory) |
| Robiola di Roccaverano | 1996 | Cow (max 85%) Sheep and/or Goat (min 15%) | Piedmont | Provinces of Alessandria, Asti |
| Sopressa delle Giudicarie | 2003 | Cow | Trentino-Alto Adige/Südtirol | Western Trentino |
| Stelvio or Stilfser | 2007 | Cow | Trentino-Alto Adige/Südtirol | Bolzano-Bozen |
| Talaggia | 1006 | Cow | Lombardy | Bergamo, Brescia, Como, Cremona, Lodi, Milan, Pavia |
| <u>Taleggio</u> | 1996 Cow | | Veneto Piedmont | Treviso Novara |
| Toma Piemontese | 1996 | Cow | Piedmont | Alessandria, Asti, <u>Biella</u> , Cuneo, Novara, Turin, Vercelli |

Valle d'Aosta Fromadzo (or Vallée d'Aoste Fromadzo)

Valtellina casera

1996

Cow

Aosta Valley

(Entire territory)

Cow

Lombardy

Sondrio

Source: Assolatte – Italian Milk/Dairy Association

Italian Cheese Production in 2008 (tons)

| Cheese Froduction in 2006 (tons) | | Tons of milk | Tons of product |
|----------------------------------|-------------------|--------------|---------------------------------------|
| P R O D UCT | Type of Milk used | used | produced |
| Cheeses | Type of Min usea | uscu | produced |
| Grana Padano | С | 2,295,159 | 163,341 |
| Mozzarella | C | 1,789,200 | |
| Parmigiano Reggiano | C | 1,707,799 | |
| Crescenza | C | 498,150 | |
| Gorgonzola | C | 412,000 | |
| Other hard cheeses | C | 198,800 | |
| Caciotte | C | 207,000 | |
| Other fresh and soft cheeses | C | 238,000 | |
| Asiago | C | 215,684 | |
| Provolone | C | 175,974 | |
| Other string cheeses | C | 108,350 | · · · · · · · · · · · · · · · · · · · |
| Provolone Valpadana | C | 95,100 | |
| Italico | C | 80,820 | |
| Montasio | C | 67,275 | |
| Taleggio | C | 65,265 | · · |
| Mascarpone | C | 51,750 | |
| Fontina | C | 38,714 | |
| Quartirolo Lombardo | C | 30,829 | |
| Valtellina Casera | C | 15,100 | |
| Caciocavallo Silano | C | 9,100 | |
| Toma Piemontese | Č | 15,914 | |
| Monte Veronese | C | 5,981 | |
| Ragusano | C | 1,998 | |
| Spressa delle giudicarie | C | 1,772 | 149 |
| Formai de mut | C | 708 | |
| Valle d'Aosta Fromadzo | С | 57 | |
| Stelvio | С | 10,215 | |
| Pecorino Romano | S | 170,112 | 29,461 |
| Formaggi ovini non DOP | S | 180,000 | |
| Pecorino Sardo | S | 12,113 | |
| Pecorino Toscano | S | 15,965 | |
| Fiore Sardo | S | 3,025 | 605 |
| Canestrato Pugliese | S | 431 | 75 |
| Pecorino Siciliano | S | 298 | |
| Mozzarella di bufala campana | В | 135,831 | 31,960 |
| Mozzarella di bufala | В | 48,240 | |
| Formaggi di capra | C | 91,000 | |
| Raschera | C(S/C) | 7,860 | |

| Bra | C(S/C) | 7,825 | 762 |
|---------------------------|--------|------------|-----------|
| Bitto | C/C | 2,900 | 290 |
| Castelmagno | C(S/C) | 1,890 | 197 |
| Casciotta di Urbino | C/S | 1,582 | 229 |
| Robiola di Roccaverano | C/S/C | 981 | 99 |
| Murazzano | S/C | 108 | 21 |
| Other mixes cheeses | CSCB | 535,820 | 79,817 |
| Milk based products | | | |
| Yogurt | С | 224,000 | 200,000 |
| Other milk based products | С | 840,000 | 140,000 |
| TOTAL | С | 10,616,695 | 1,346,369 |

C=cow milk

S=sheep milk

G=goat milk

B=buffalo milk

C/S=cow and sheep milk

Source: Assolatte - Italian Milk/Dairy Association

Italian DOP Cheese Production in 2008 (tons)

| Cheeses | Production 2008 | Amount of milk used |
|------------------------------|-----------------|---------------------|
| Grana Padano | 163,341 | 2,295,159 |
| Parmigiano Reggiano | 116,064 | 1,707,799 |
| Gorgonzola | 48,720 | 412,000 |
| Mozzarella di Bufala Campana | 31,960 | 135,831 |
| Pecorino Romano | 29,461 | 170,112 |
| Asiago | 23,318 | 215,684 |
| Provolone Valpadana | 9,600 | 95,100 |
| Taleggio | 8,800 | 65,265 |
| Montasio | 7,349 | 67,275 |
| Fontina | 3,747 | 38,714 |
| Quartirolo Lombardo | 3,693 | 30,829 |
| Pecorino Toscano | 2,816 | 15,965 |
| Pecorino Sardo | 1,960 | 12,113 |
| Toma Piemontese | 1,391 | 15,914 |
| Valtellina Casera | 1,360 | 15,100 |
| Stelvio | 1,112 | 10,215 |
| Raschera | 786 | 7,860 |
| Bra | 762 | 7,825 |
| Caciocavallo Silano | 750 | 9,100 |
| Fiore Sardo | 605 | 3,025 |
| Monte Veronese | 568 | 5,981 |
| Bitto | 290 | 2,900 |
| Casciotta d'Urbino | 229 | 1,582 |
| Castelmagno | 197 | 1,890 |
| | | |

| Ragusano | 180 | 1,998 |
|--------------------------|---------|-----------|
| Spressa delle Giudicarie | 149 | 1,772 |
| Robiola di Roccaverano | 99 | 981 |
| Canestrato Pugliese | 75 | 431 |
| Formai de Mut | 71 | 708 |
| Pecorino Siciliano | 53 | 298 |
| Murazzano | 21 | 108 |
| Valle d'Aosta Fromadzo | 5 | 57 |
| Total | 459,532 | 5,349,591 |

Source: Assolatte – Italian Milk/Dairy Association