napa valley vintners

VINS DE BORDEAUX

Bordeaux & the Napa Valley Comparative Tasting & DIscussion

Society of Wine Educators Annual Conference, 2016

Mary Gorman-McAdams, MW, Bordeaux Wine Council
Connor Best, CSW, Napa Valley Vintners
Linda Lawry, DWS, SWE, International Wine Center

VINS DE BORDEAUX

280,000 acres of vineyard

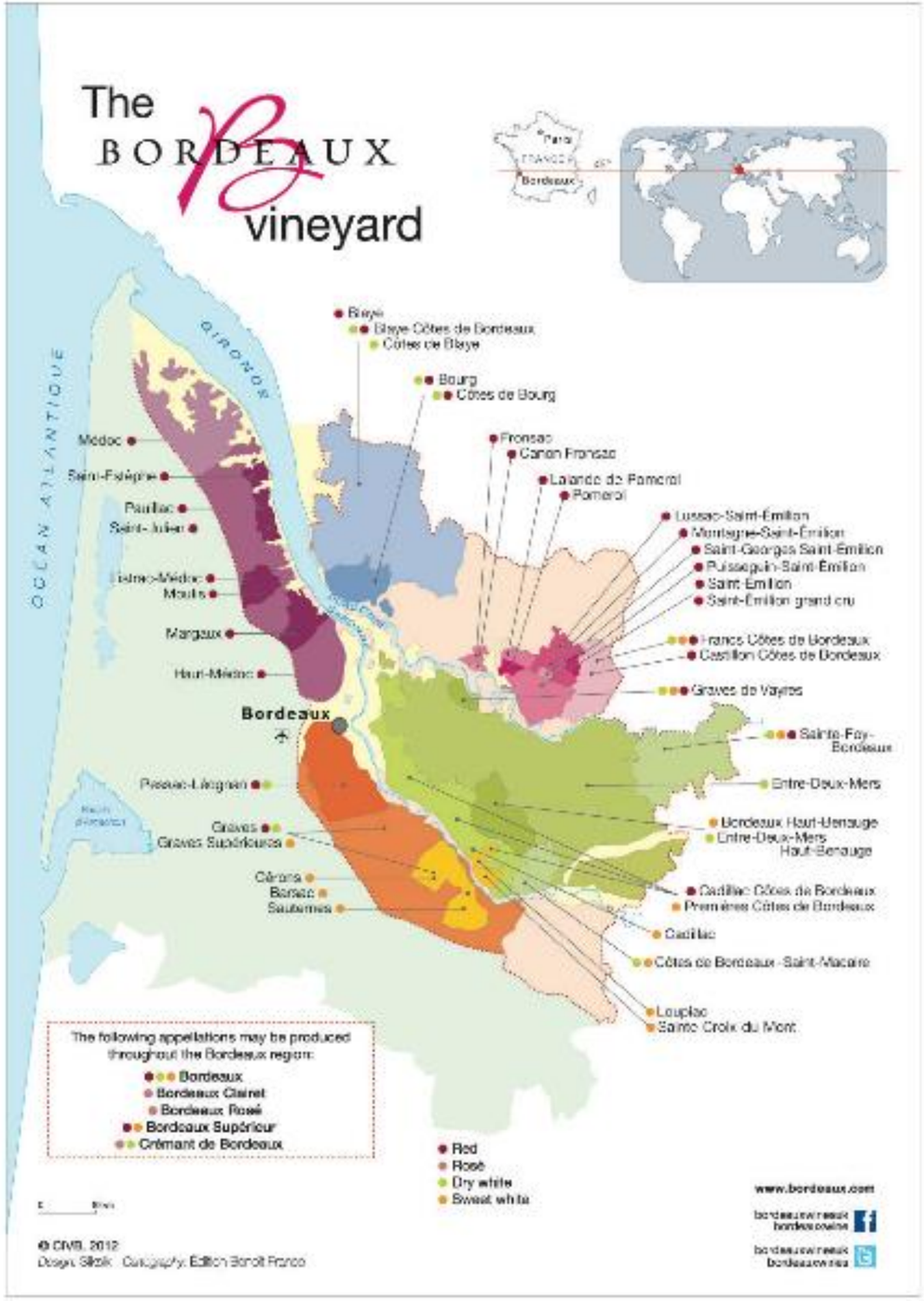
65 Appellations

Diverse Wines
Red, Dry White, Rosé , Sweet White, Sparkling

6+ times size of Napa Valley

Average Production = 5.3 million hectoliters

6460 Winegrowers
300 merchants
84 Brokers
34 Cooperatives



VINS DE BORDEAUX

45,000 acres of vineyard

16 nested AVAs

Diverse Wines
Red, Dry White, Rosé , Sweet White, Sparkling

1/6 size of Bordeaux

Average Production = .8 million hectoliters

450 Physical Wineries
800+ wine brands
700+ growers

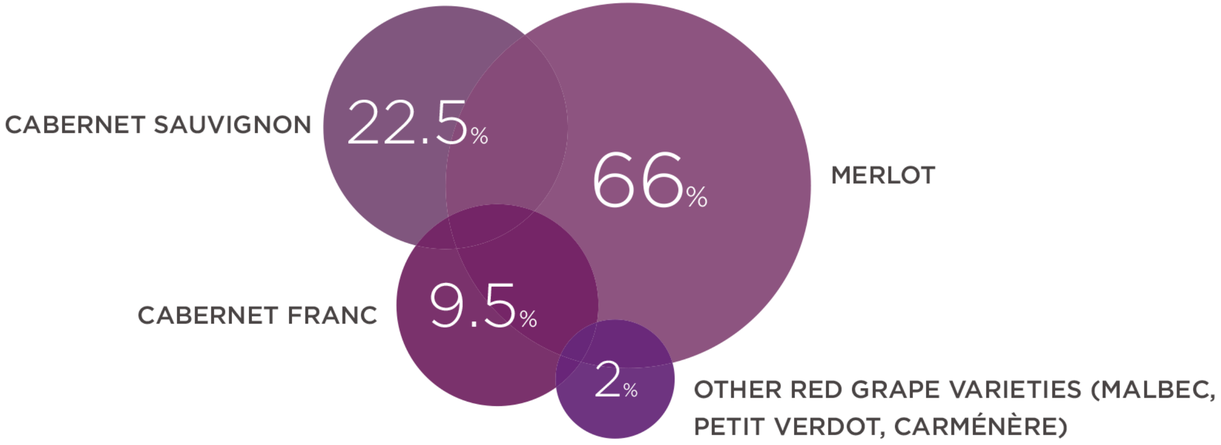
VINS DE BORDEAUX

BORDEAUX - PLANTED VARIETIES

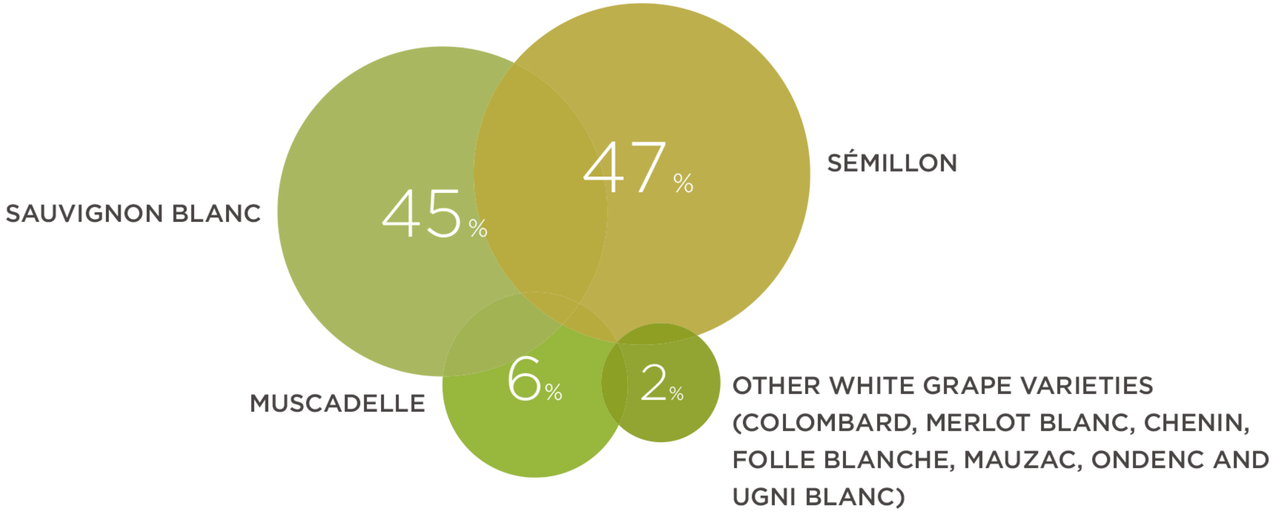
Bordeaux is the leading producer of Merlot worldwide.

89% Red Varieties
11% white Varieties

SURFACE AREA BY RED GRAPE VARIETY:



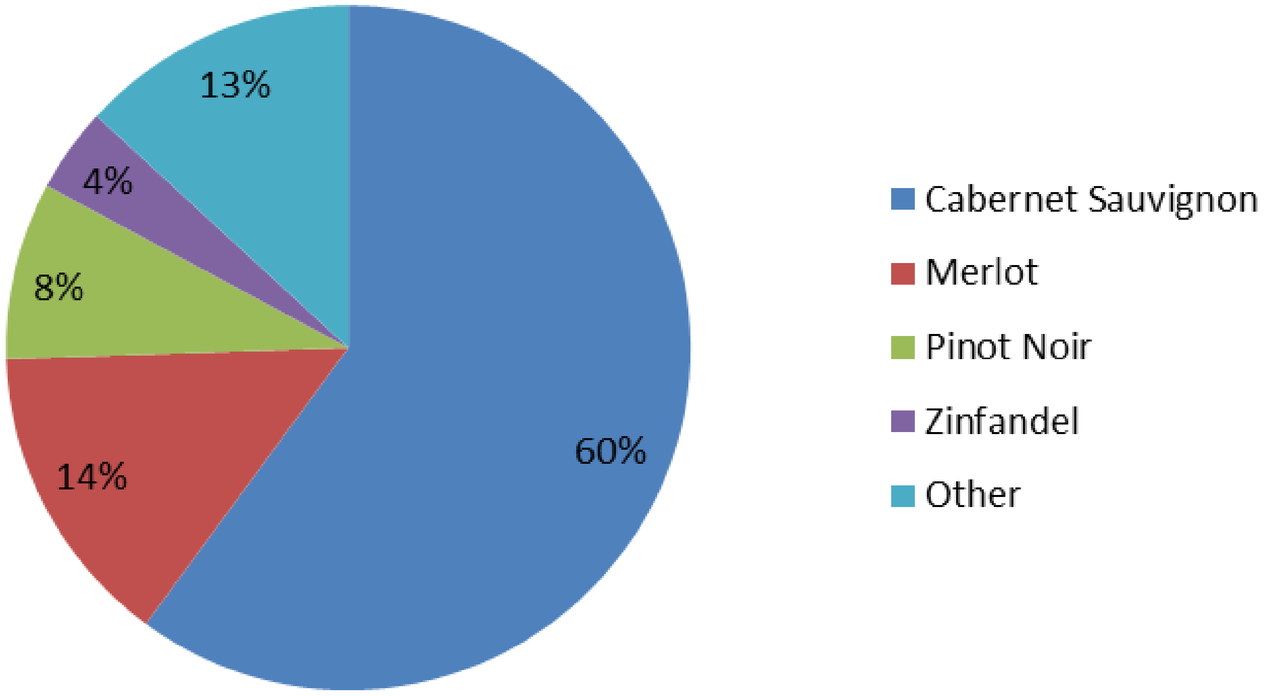
SURFACE AREA BY WHITE GRAPE VARIETY:

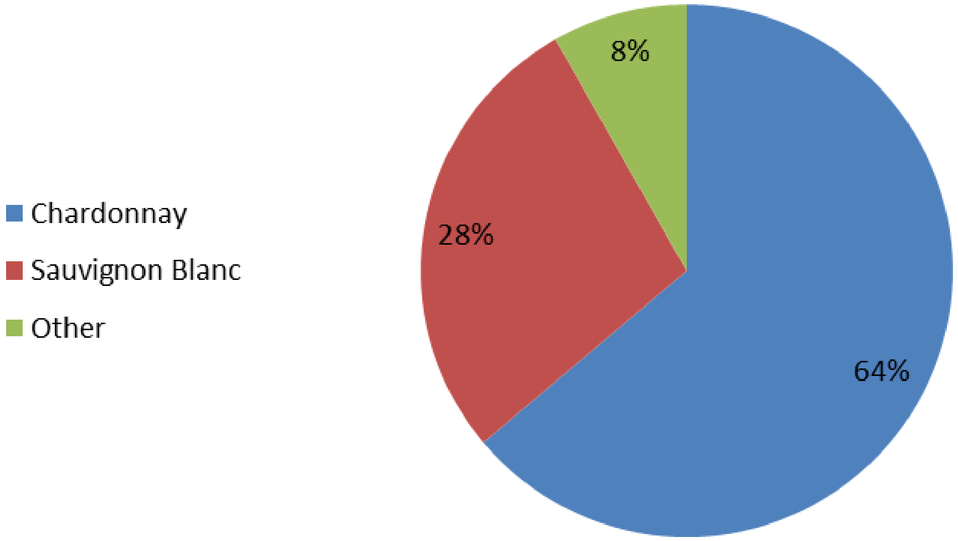


Napa Valley Planted Varieties

77% Red Grapes

23% White Grapes





VINS DE BORDEAUX

BORDEAUX AND NAPA VALLEY

- Probably two of the greatest wine regions for producing Cabernet Sauvignon based wines
- Both also produce top quality wines based on Merlot and Sauvignon Blanc
- Bordeaux investment / influence in Napa Valley
    - Opus One (Mondavi and Mouton Rothschild)
    - Dominus (Christian Moueix)
    - Eisele Vineyard (Chateau LaTour)
    - Inglenook (Philippe Bascaules from Chateau Margaux)
    - Clos du Val (Bernard Portet from Lafite)
    - Pontet Canet (Villa Sorisso)

VINS DE BORDEAUX

MUTUAL INFLUENCE

- What Napa Valley learned from Bordeaux
  - Culture of making great wine – wines with refinement, balance and freshness
  - Whilst not widespread – the concept of dry farming and a non-automatic approach to acidification
- What Bordeaux has learned from Napa Valley
  - Concept of making more opulent, generous, fruit driven wines
  - Concept of making wines for earlier drinking

VINS DE BORDEAUX

CLIMATE COMPARISON

- Napa Valley is warmer than Bordeaux
  - Median growing days in Yountville = 1898 days
  - Median growing days in Bordeaux is 1400 to 1500 days
- Napa Valley = more extreme climate – Bordeaux has more of a gentle changeability (gradual maritime climate)
- Climatic threats near and at harvest
  - Napa Valley = heat spikes
  - Bordeaux = rain and cold
- Bordeaux more humid than Napa
- Napa Valley has a greater diurnal difference than Bordeaux

VINS DE BORDEAUX

BORDEAUX – NAPA VALLEY

Bordeaux

- Rainfall
  - Total annual precipitation is circa 923 mm (36.3 inches)
- Average temperatures
  - Winter = 44 °F - but recent winters have been warmer than this.
  - Summer = is 67 to 68 °F

Napa Valley

- Rainfall
  - 20-40 inches almost exclusively in winter months
- Average Temperatures
  - Winter = 40°F average low; 62 °F average high
  - Summer = 50°F average low; 85°F average high

VITICULTURE TODAY – BORDEAUX AND NAPA VALLEY

Bordeaux

- Greater focus on the vineyard
- Soil mapping – ‘parcelated’ viti
- Water management / hydric stress (impact on vintage quality)_
- More precision and sustainable viti
  - SME/EMS: collective environmental management system
- Organic, biodynamic – circa 7% certified
  - BUT 45% Bordeaux vineyard certified in some shape or form

Napa Valley

- Similar focus on vineyard and technology
- Commitment to sustainability
  - Napa Green Land and Winery Programs
  - 40% of vineyards Napa Green certified
  - 90% of County under protection from development
  - Organic/Biodynamic farming is common

VINS DE
BORDEAUX

Tasting and Comparing Sauvignon Blanc Wines

Wines 1, 2, 3 and 4

VINS DE BORDEAUX

SAUVIGNON BLANC

- Contrary to popular opinion Sauvignon Blanc is not likely to have originated in Bordeaux – more likely the Loire Valley.
- Savagnin possibly one of SB's parents. DNA profiling also suggests that both Chenin Blanc and Trousseau are SB sibling. Some relationship with Semillon also suggested.
- Second most planted white variety in Bordeaux after Semillon – plantings increasing alongside the growth trend for Dry White Bordeaux .
- Second most planted white variety ion Napa – after Chardonnay
- Just over 5500 ha planted to SB – of which 4300 for dry white wine (27,000 ha planted in France)
- Innovations: 1990's Bordeaux – Role of the late Professorr Denis Dubourdieu and Andre Lurton - Discovery of the pre-cursor aroma molecules

VINS DE BORDEAUX

PLANTINGS – SAUVIGNON BLANC

Bordeaux

- Circa 4200 hectares (10,400 acres) SB - of a total of 9280 ha of white varieties – 45%
- Most used for wines labeled as AOC Bordeaux
- Most dry white Bordeaux are blends
- Dry whites represents circa 9% of Bordeaux wine

Napa Valley

- 4,000 hectares (10,000 acres) of white varieties – 23%
- 1,100 hectares of (2,800 acres) of Sauvignon Blanc
- 63 hectares (155 acres) of Semillon
- Most produced as dry, varietal-labeled wines

VINS DE BORDEAUX

CHATEAU LA RAME BLANC SEC, 2014

- Family (Armand) property - 40 KM SE of Bordeaux city in Sainte Croix du Mont appellation.
- Soils: 20 hectares on a clay-limestone soil – sub-soils marked by a bed of fossilized oysters dating from the Tertiary era.
- Hillside vineyards overlooking the Garonne River, facing south toward river.
- Grapes for the dry white – 4 ha vineyard (circa 14% production)
- Vines: Average age 25 years, massale selection on 101-14 rootstock (5000 vines/ha)
- 100% Sauvignon Blanc, some PFM, stainless steel fermentation, natural yeast
- Unoaked – aged on lees 6 months in vats

VINS DE BORDEAUX

LE PETIT COQUEREL, 2014, NAPA VALLEY

- AVA: Predominantly estate vineyard in Calistoga – Cockerell family
- Soils/viticulture: Deep clay with high water holding capacity; vigor control and canopy management are important; dry farmed except for one irrigation in early August
- Aspect: Benchland at base of Mayacamas Mountains (avoiding much of the evening sun)
- Blend: 100% Sauvignon Blanc
- Vines: ~ 10 years old
- Winemaking: Stainless and aged on lees for 9 months; weekly batonage

VINS DE BORDEAUX

LES HAUTS DE SMITH BLANC, 2012

- Appellation: Pessac Léognan
- 100% Sauvignon Blanc
- Soils: Gravelly soil (outcrop of the rare Günze gravel – high iron content) with alluvial, sandy and stony deposits.
  - White varieties grown on cooler, north-facing ‘more clay’ soils
- Clone/s: Own massale selection + clones 316, 317, 906.
- Rootstocks = 3309C for more gravels soils ; 101-14 for wetter soils and Fercal for the parcels with high level of limestone
- Viti: Organic viticulture , density = 9000 vines/ha
- Hand harvested, natural fermentation in barrel (50% new)
- Aged 10 months on lees with batonnage

VINS DE BORDEAUX

ST. SUPÉRY, DOLLARHIDE ESTATE VINEYARD, 2015, NAPA VALLEY

- AVA: Napa Valley (eastern hills of Napa County)
- Soils/viticulture: Tehama Silt Loam; Napa Green Land certified vineyard
- Aspect: Varied
- Blend: 100% Sauvignon Blanc
- Vines: ~ 10 years old
- Winemaking: fermentation in stainless steel and oak barrels (17% new French oak); 7 month sur-lie maturation

VINS DE
BORDEAUX

Tasting and Comparing Merlot Wines Wines

Wines 5 and 6

VINS DE BORDEAUX

MERLOT

- Fleshy, widely planted variety
- World's second most planted red variety (University of Adelaide database 2010) – Cabernet Sauvignon = #1
- Like Cabernet Sauvignon, Merlot originated in Bordeaux
- A chance crossing between Cabernet Franc + Magdeleine Noir de Charente
- The most planted variety in France and in Bordeaux
  - Bordeaux has the most plantings of Merlot worldwide (almost 70,000 ha / 173,000 acres)
  - Challenge "the merlotization' of Bordeaux
- The third most planted variety in Napa Valley

VINS DE BORDEAUX

MERLOT – PREFERRED ENVIRONMENT

- Early budding and mid ripening (about 3 weeks earlier than Cabernet Sauvignon) – Bordeaux's earliest ripening red variety
- Well suited to cooler clay-limestone soils
- Less fussy than Cabernet regarding soils and growing conditions.
- In Bordeaux it has a particular affinity with Pomerol plateau
- In Napa Valley, Merlot is found throughout the AVA often (but not exclusively) in heavier clay coils nearer the Napa river
- Favored rootstocks in Bordeaux are low vigor Riparia Gloire de Montpelier or 3309 (or some 420A to slow down ripening)
- Provides the flesh and fruit for Bordeaux Cabernet wines.

VINS DE BORDEAUX

PLANTINGS OF MERLOT

Bordeaux

- 69,500 ha (out of total 105,000 ha) – 66%
- Most associated and dominant on the Right Bank but also widely planted on Left Bank
- Key variety in Bordeaux wines – adds flesh, texture, roundness to the blend.

Napa Valley

- 1,920 ha (4,750 acres) out of 18,000 ha – 11%
- Planted throughout, but often in clay soils near Napa River
- Bottled varietally or blended into Cab-based blends

VINS DE BORDEAUX

CHATEAU LA POINTE, 2012, POMEROL

- Appellation: Pomerol
- Blend: 85% Merlot, 15% Cabernet Franc
- Location: large estate (22 ha – second largest in Pomerol) - sustainable viti
- Soils: gravelly soil with pebbles from the Isle river terraces, clay-gravel soil , sandy soil on clay and sandy soil on gravel
- Vines on 3309 rootstock and planting density is 8100 vines/ha
- Fermemeted mainly in cement vats with some stainless steel.
- Aged 12 months – 50% new barrique

BLACKBIRD VINEYARDS ARISE, 2013, NAPA VALLEY

- AVAs: Napa Valley (sourced from multiple vineyards)
- Blend: 55% Merlot, 30% Cabernet Sauvignon, 15% Cabernet Franc
- Soils: Primarily from vineyards with gravelly and silty clay loam; many varied depending on vineyard source
- Winemaking: 21 months in French oak, 50% new

VINS DE
BORDEAUX

Tasting and Comparing Cabernet Sauvignon Wines

Wines 7, 8, 9 and 10

VINS DE BORDEAUX

CABERNET SAUVIGNON

Of the six black grape varieties in Bordeaux all but PV are inter-related:

- Originated in Bordeaux BUT not an ancient grape
- A chance crossing: Cabernet Franc x Sauvignon Blanc
- Cabernet Franc - origins likely go back to the Pyrenees (in Bdx thousands of years)
- Cabernet Sauvignon = the most planted black variety in the world with 300,000 ha planted
  - Only 26,000 ha in Bordeaux (64,200 acres)
  - 8,100 ha (20,000 acres) in Napa Valley
- Tends to be planted in same wine regions as Merlot
- France, and indeed Bordeaux has more Merlot than Cabernet Sauvignon
- In contrast in New World wine regions have more Cabernet Sauvignon planted than Merlot

VINS DE BORDEAUX

CABERNET SAUVIGNON – ITS PREFERRED ENVIRONMENT

- Late budding and late ripening variety
- Rootstocks – low vigior – RGM, 3309 and 101-14
- Growing season temperature is very critical - needs a long growing season to ripen
  - Issue of volatile pyrazine compounds
- Produces tannic wines with great aging potential
- Bordeaux: Climate wise is at the bottom of the league of suitable places to grow Cabernet Sauvignon
- Napa Valley: long, dry and warm growing season is ideal ripening Cabernet Sauvignon

PLANTINGS OF CABERNET SAUVIGNON

Bordeaux

- 23,800 ha (59,000 acres) planted in Bordeaux
- Mainly on Left Bank
- Mainly in top communes of Medoc and in Graves
- Preferred soils = well drained gravels

Napa Valley

- 8,100 ha (20,000 acres) in Napa Valley
- Planted throughout valley with only small plantings in extreme southern areas
- Preferred soils = well drained alluvial fan and mountainside soils

VINS DE BORDEAUX

CHATEAU CANTEMERLE, 2012, HAUT MÉDOC

- Fifth Growth located in commune of Macau – 91 ha under vine
- Blend: 56% Cabernet Sauvignon, 36% Merlot, 6% Petit Verdot, 2% Cabernet Franc
- Soils: Silica-gravel soils of the quaternary era
- Rootstocks: 3309-10114 Riparia Gloire
- Average age of vines: 30 years
- Vine density: 9600
- Viticulture: Sustainable
- Hand harvested, destemmed, sorted, vatting 28-30 days. Maturation for 16 months - 12 months in French oak casks (50% new oak) 4 months in vat after blending

VINS DE BORDEAUX

TREFETHEN FAMILY VINEYARDS, 2013, OAK KNOLL DISTRICT

- Winery originally founded in 1880s and re-established in 1968.
- AVA: Oak Knoll District of the Napa Valley
- Blend: 93% Cabernet Sauvginon, 4% Malbec, 2% Petit Verdot and 1% Merlot
- Soils: Ancient flood plan; Cabernet Sauvignon planted in the most gravelly places
- Clones & rootstocks: Cabernet primarily planted to clone 4 with secondary plantings of clones 2 and 6; >50 rootstock/clone combinations on property
- Viticulture: Napa Green Land (sustainable); irrigation only as needed with recycled water
- Winemaking: aged 18 months in 60% French, 28% American and 12% Hungarian oak; 45% new

VINS DE BORDEAUX

CHÂTEAU PÉDESCLAUX, PAUILLAC

- 5th Growth located in Pauillac
- Blend: 63% Cabernet Sauvignon, 32% Merlot, 5% Cabernet Franc
- Soils: Gravel over clay sub-soil
- Rootstocks – 3309 and RGM
- Vinification: 10 day cold soak. Vinified plot by plot (29). Extraction using délestages and pigeages. MLF in mix of vat and barrels (30%).
- Maturation: 70% new barrels for 15 months - For the first two months of barrel aging, the wine is aged on its lees

VINS DE BORDEAUX

O'SHAUGHNESSY, HOWELL MOUNTAIN, 2013, NAPA VALLEY

- AVA: Howell Mountain (~1,800 feet above sea level)
- Blend: 76% Cabernet Sauvignon, 5% Malbec, 5% Merlot, 4% St. Macaire, 4% Petit Verdot, 3% Carmenere and 3% Cabernet Franc
- Soils: Tufa (mix of volcanic ash and red clay)
- Clones & rootstocks: Cabernet Sauvignon primarly Terra Rouge, 337 and 4; primary Cabernet rootstocks are 101-14, 110R and 3309
- Winemaking: aged 20 months in French oak; 80% new

VINS DE BORDEAUX

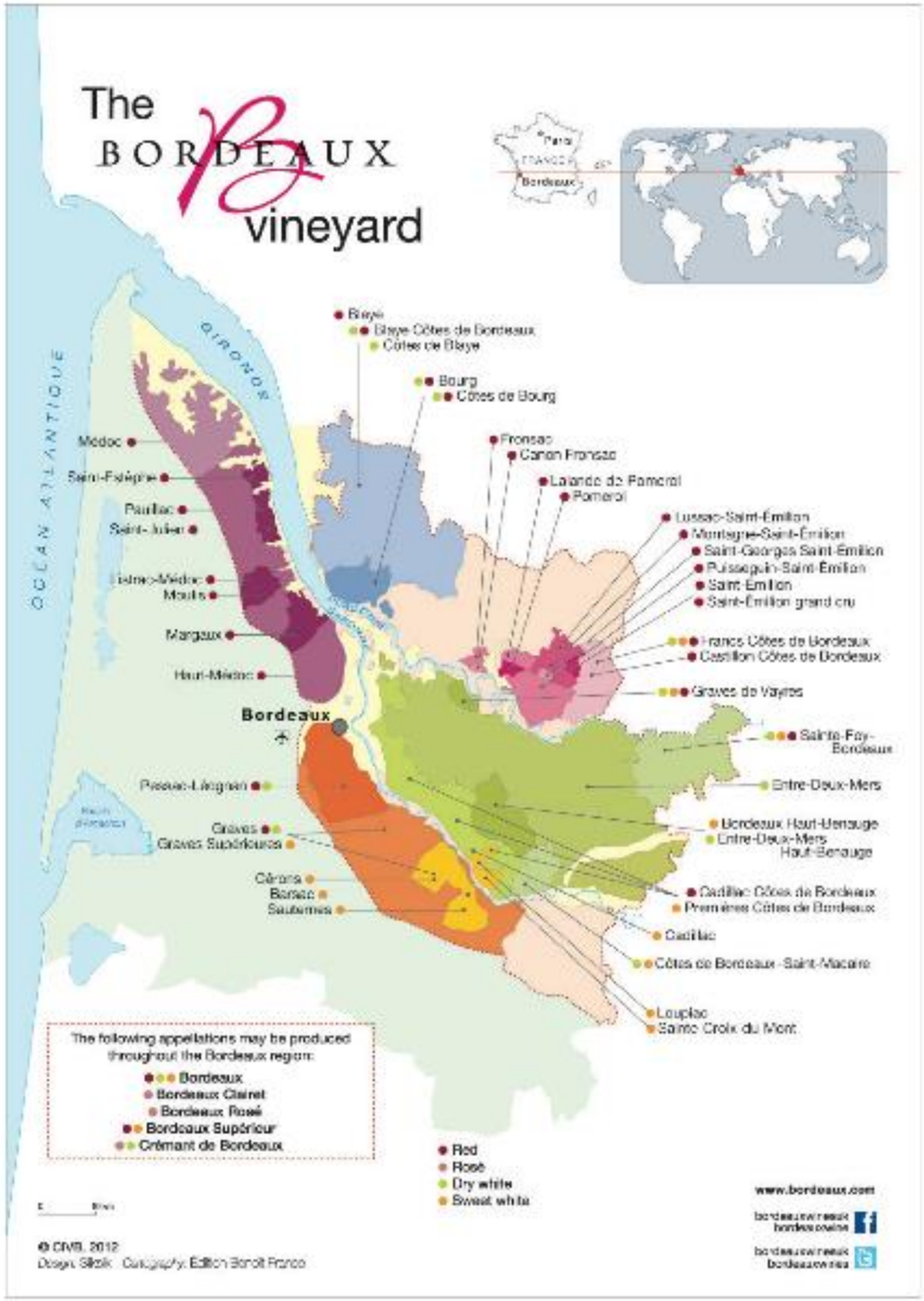
THANK YOU!

Questions

mary.gorman@vins-bordeaux.fr

l.lawry@internationalwinecenter.com

cbest@napavintners.com



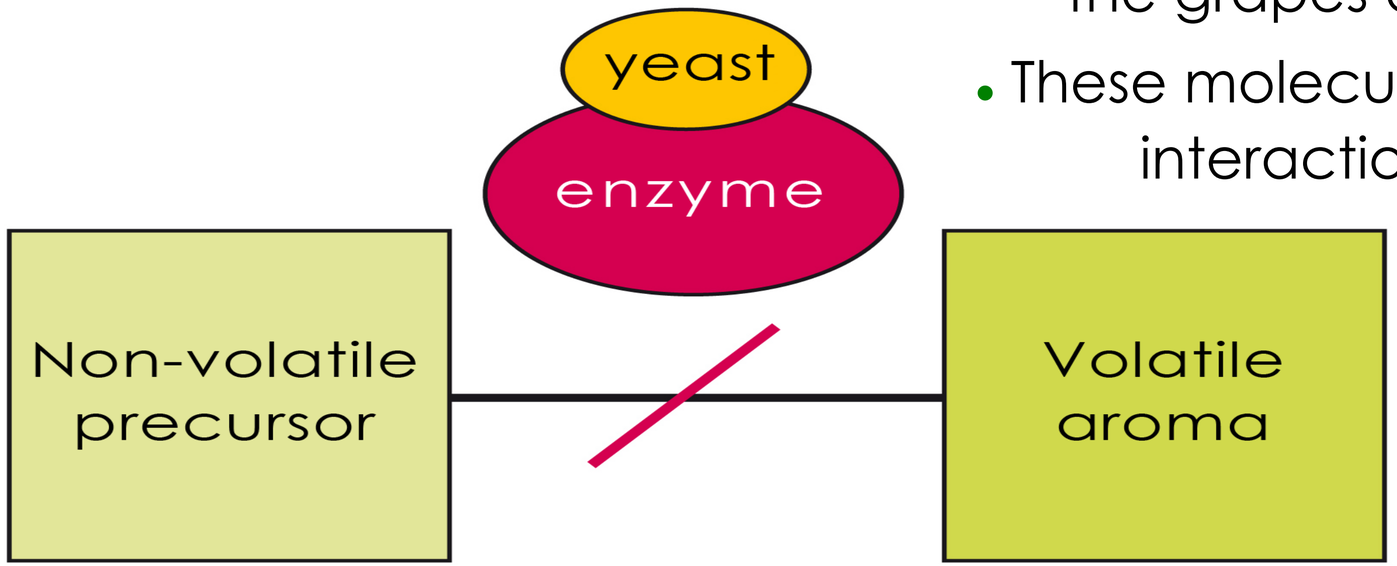
CHARACTERISTICS OF SAUVIGNON BLANC

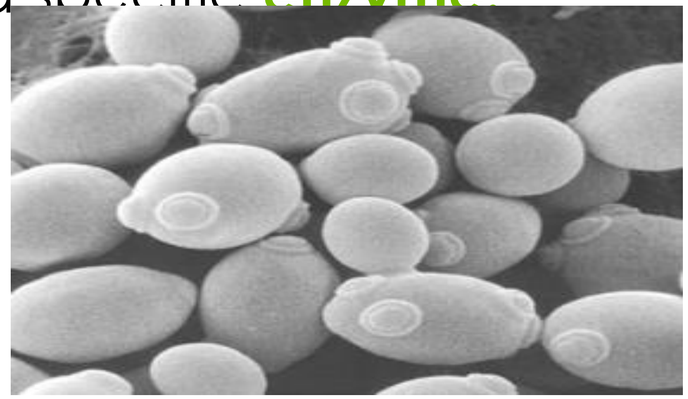
- Early to mid-ripening , very vigorous and need low vigor rootstocks in poor soils
- 1990’s – Revolution of Dry White Winemaking in Bordeaux
  - Role of **André Lurton** + **Prof. Denis Dubourdieu**
  - Identification of the compounds responsible for creating characteristic aromas in SB
  - Understanding how to harness these
    - moderate hydric stress + controlled supply of N encourages the production of aroma precursors in the grapes + reduce phenolic compound content
  - Choice of yeast strain, fermentation temps, avoiding oxidation of musts – protective winemaking
  - Lees ageing and stirring, oak/INOX maturation, cork/screwcap

Sauvignon Blanc characteristic aromas

Origin and formation of molecules responsible for creating aromas

- These molecules exist in the form of **non-volatile precursors** found in the grapes and therefore in the musts.
- These molecules become volatile with the interaction of a specific **enzyme**.





VINS DE BORDEAUX

ORIGIN OF CABERNET SAUVIGNON CLONES

Clone	Origin
15	AOP Bordeaux Supérieur
169	AOP Bordeaux Supérieur
170	Loire Valley
171	AOP Saint-Emilion
337	AOP Côtes de Blaye
338	AOP Saint- Emilion
341	AOP Saint-Emilion
412	Bordeaux region
685	South west France
1124	Sanitation of clone 191
1125	Sanitary clone of clone 337

VINS DE BORDEAUX

BORDEAUX

Table I

Weather indicators for 2015: rainfall and temperature (compared to the 1981-2010 average) and hours of sunshine (compared with the 1991-2010 average)
Data from Mérignac (Météo France)

	Hours of sunshine (h)		Precipitation (mm)		T°C average minimum (°C)		T°C. average maximum (°C)	
	2015	Average 1991-2010	**2015**	Average 1981-2010	**2015**	Average 1981-2010	**2015**	Average 1981-2010
January	**75**	95	**93**	87	**3.1**	3.1	**10.3**	10.0
February	**113**	115	**79**	71	**2.5**	3.3	**10.6**	11.7
March	**107**	170	**38**	65	**6.2**	5.4	**14.5**	15.1
April	**197**	182	**27**	78	**9**	7.4	**20**	17.3
May	**201**	217	**33**	80	**11.6**	11.0	**21.3**	21.2
June	**300**	239	**43**	62	**14.7**	14.1	**27.3**	24.5
July	**281**	249	**35**	50	**17**	15.8	**29.1**	26.9
August	**251**	241	**87**	56	**16.3**	15.7	**27.9**	21.7
September	**204**	203	**35**	84	**12.2**	12.9	**22.7**	24.0
October	**169**	147	**52**	93	**9.4**	10.4	**18.4**	19.4