

Joh. Barth & Sohn

HOPFEN seit 1794

1794—1954

160 YEARS

Cable address
BARTHSONN NUERNBERG

Telephone: No. 50851/54

Telex: No. 06/2280

Hop farm Barthhof-Hallertau

Warehouse Nuernberg
Glockenhofstraße 24/26

Nürnberg, July 27th, 1954
P. O. B. 331

Hop Report 1953/54

Price levels for most important consumer goods on the world's markets were generally maintained. As far as there was no excessive production, downward trends remained within limits although trading was somewhat slower.

**Economical
Situation**

The German balance of exchange continued its satisfactory development. About 80% of the currency in circulation are covered by gold or foreign exchange at the disposal of the *Bank deutscher Länder*. Efforts continue to realize the free convertibility of the D-Mark.

The lack of working capital is still much in evidence. A tax reform is under discussion, which should allow the accumulation of crisis resistant means within the German economy.

An **Increased Production** of beer during 1953 as compared with 1952 is shown in the following countries: Australia 3%, Bolivia 2%, Canada 4.7%, Chile 1%, Germany 11%, Finland 1.7%, Japan 10%, Luxembourg 3.4%, New Zealand 20.5%, Netherlands 13.7%, Norway 2.5%, Austria 11.2%, Saar 14.2%, Sweden 3.4%, Thailand 20%, USA 1.8%, Ireland 1.6%, Denmark 1%.

**Production
of Beer**

A **Lower Production** in 1953 as against 1952 is to be noted in: Belgium 3.8%, France 1.3%, Italy 9.2%, Yugoslavia 38.4%, Union of South Africa 6%, South West Africa 4.8%, Turkey 7.5%, Uganda 6%.

| | |
|--|--|
| 1 ha = 2.934 bayr. Tagwerk, | 1 bayr. Tagwerk = 0.341 ha |
| 1 ha = 2.471 acres | 1 acre = 0.405 ha |
| 1 Liter = 0.2642 gall. (USA.) | 1 gall. (USA.) = 3.7835 Liter |
| 0.2201 gall. (Brit.) | 1 gall. (Brit.) = 4.5435 Liter |
| 1 hl = 100 Liter = 26.42 gall. = 0.8523 bbl. (USA.) | 1 bbl. (USA.) = 31 gall. = 1.1734 hl |
| 22.01 gall. = 0.6114 bbl. (Brit.) | 1 bbl. (Brit.) = 36 gall. = 1.6356 hl |
| 1 kg = 2.20462 lbs. | 1 lb. = 0.45359 kg |
| 1 shortton (sht) = 2000 lbs. | = 907.185 kg |
| 1 longton (lgt) = 2240 lbs. | = 1016.048 kg |
| 1 metr. Tonne = 20 Ztr. = 1000 kg = 1.10231 shorttons = 0.98419 longtons | |
| 1 Ztr. = 50 kg = 110.23 lbs. = 0.984 cwt. (Brit.) | 1 cwt. (Brit.) = 112 lbs. = 50.8 kg = 1.016 Ztr. |
| | 1.102 cwt. (USA.) |
| 1 quarter (qr) = 400 lbs. = 181.44 kg (barley) | 1 Ztr. = 0.27555 qr. |
| 1 bushel (bu) = 48 lbs. = 21.77 kg (barley, malt) | 1 Ztr. = 2.2965 bu. |
| 56 lbs. = 25.4 kg (corn, milocorn) | 1 Ztr. = 1.9685 bu. |
| DM 1.— = US \$ —.23809 / DM 4.20 = US \$ 1.— / US \$ 2.80 = DM 11.76 = £ 1.—.— | |
| 1 mm precipitations = 1 Ltr. of water per m ² , 1 mm = 0.04", 1" = 25 mm. | |

In case of reproduction please give credit to Joh. Barth & Sohn, Nürnberg.

Production of beer 1953

| Country | 1000 bbl. of 31 gall. each | Country | 1000 bbl. of 31 gall. each |
|-------------------------------|----------------------------------|------------------------------------|----------------------------------|
| USA | 92,115 | Indochina | 384 |
| England | 34,825 | Luxembourg | 309 |
| Germany West 25,308 | | Ecuador | 273 |
| East 4,687 *) | 29,995 | Singapore *) | 260 |
| USSR *) | 11,505 | Algiers *) | 256 |
| Belgium | 10,551 | Morocco *) | 256 |
| Czechoslovakia *) | 8,522 | Bolivia | 251 |
| Canada | 8,309 | Egypt *) | 190 |
| Australia | 7,156 | Indonesia *) | 187 |
| France | 7,108 | Turkey | 179 |
| Brazil *) | 6,392 | Greece *) | 154 |
| Mexico | 4,897 | French West Africa *) | 136 |
| Austria | 3,590 | Kenya *) | 118 |
| Columbia *) | 3,238 | Portugal *) | 114 |
| Argentina | 2,983 | Tunis *) | 77 |
| Poland *) | 2,983 | Dominican Republic *) | 60 |
| Denmark | 2,920 | Nigeria | 55 |
| Japan | 2,812 | Paraguay *) | 51 |
| Ireland | 2,616 | Gold Coast *) | 38 |
| Sweden | 2,424 | Moçambique *) | 38 |
| Switzerland | 2,013 | Costa Rica | 37 |
| Netherlands | 1,561 | Iran | 37 |
| New Zealand | 1,525 | Hong Kong *) | 35 |
| Italy | 1,282 | Cameroons *) | 34 |
| Venezuela *) | 1,108 | South West Africa | 34 |
| Spain *) | 1,087 | Ivory Coast *) | 26 |
| Cuba | 1,023 | French Equatorial Africa | 26 |
| Finland | 929 | Libanon | 23 |
| Chile | 920 | Ceylon | 22 |
| South African Union | 872 | Thailand | 20 |
| Peru *) | 852 | Tanganyika | 20 |
| Saar | 637 | India | 14 |
| Belgian Congo *) | 618 | Martinique *) | 13 |
| Norway | 571 | Uganda | 13 |
| Uruguay | 490 | Iceland | 13 |
| Yugoslavia | 484 | Pakistan | 9 |
| Philippines | 426 | Madagaskar | 4 |

*) = estimate

Production of Beer in Western Germany during the calendar year 1953

| | |
|--|--------------------------------|
| amounted to | 24,517,055 bbls. |
| Output in the Western Sector of Berlin for the same period was | 790,792 bbls. |
| Total | <u>25,307,847 bbls.</u> |

The above figures include 372,426 bbls. delivered taxfree to the occupation forces (1952 = 373,329 bbls.) and exports including sales against foreign currency within Germany totalling 450,640 bbls. (1952 = 357,622 bbls.)

Crop 1952 (Supplement)

Final statistical data show the following total figures of imports and exports of the hops crop 1952 for various countries during the time of September 1st, 1952, to August 31st, 1953:

| | Import | Export |
|-------------------|----------------|----------------|
| Germany | 2,282,643 lbs. | 9,536,879 lbs. |
| Belgium | 3,126,123 " | 1,122,141 " |
| England | 55,000 " *) | 8,173,444 " |
| USA | 3,539,344 " | 14,265,085 " |

*) = estimate

The season 1952/53 ended quietly in practically all hop producing countries. The Hop Market in Germany, however, was an exception. Hallertau hops crop 1952 were quoted at DM 800.— at the beginning of 1953. This price receded until DM 450.— at the beginning of June 1953. Insistent offers for unsold stocks exerted a continual pressure on prices which fell until DM 300.— in August 1953.

Practically all stocks were in second hands. Losses were sustained by trading circles and by the *Deutsche Hopfenverkehrsgesellschaft (DHVG.)*. It has been possible to dispose of all stocks of crop 1952 before the new season, but the downward trend was a bad start for the market of crop 1953.

Crop 1953

Sufficient precipitations during the winter 1952/53 increased the ground moisture. The thaw set in during the second half of February and dry and sunny weather in March benefitted spring work. During the **Uncovering and Cutting** of the hops there appeared sometimes excrescences on the root stock resulting from last year's application of insecticides without, however, impairing the growth of the plants. Ample precipitations in April together with warm weather resulted in strong and healthy growth of the plants. Cold weather during the first half of May hampered the development of the hops. This was offset by warmer weather and sufficient rain during the second half of May as well as in June and July. The often sultry weather resulted in a luxuriant growth of the hops. **Bloom** was irregular whereas warm and dry weather in August with occasional rains benefitted the **Sizing** of the cones as well as the formation of lupulin and the **Ripening** of the hops.

Growth of the Hop Crop 1953 in Germany

Pests and diseases appeared only sporadically. Sprayings were conscientiously applied against **Downy Mildew** as well as **Red Spider** and **Aphids**, although this work was sometimes hampered by waterlogged gardens.

Picking began normally and was favoured by weather conditions. The abundant precipitations in 1953 made available to the plants not only fertilizer remaining in the ground from the year before but the ample and careful fertilization during 1953 as well. A secondary growth of **Burrs**, which mostly came to maturity, further augmented the quantities harvested.

The unequal sizing of the cones was the consequence of the irregular blooming of the hops.

| Weather data from the Experimental Hop Farm Hüll/Hallertau | | | | | | | |
|--|--------|--------|--------|--------|--------|--------|-------|
| 1953 | March | April | May | June | July | August | Sept. |
| Precipitations per month (mm) | 4 | 70 | 90 | 92 | 149 | 88 | 21 |
| Monthly average of air temperature °Celsius | 3.4 | 8.8 | 12.6 | 15.3 | 17.7 | 15.1 | 13.1 |
| Maxima of air temperature °Celsius | 21.6 | 24.0 | 29.4 | 27.0 | 31.5 | 28.5 | 29.6 |
| Minima of air temperature °Celsius | -6.1 | -4.0 | -2.5 | 0.7 | 5.6 | 3.6 | 1.1 |
| Monthly average of relative air humidity % | 70 | 72 | 72 | 78 | 78 | 78 | 77 |
| Other data: | | | | | | | |
| Snowfall | 3 days | — | 2 days | — | — | — | — |
| Hoarfrost | 20 " | 9 days | 5 " | 2 days | — | — | 1 day |
| Thunderstorm | — | 2 " | 2 " | 2 " | 8 days | — | — |
| Storm | — | — | 1 day | — | 3 " | — | — |
| Hail | — | — | — | 1 day | — | — | — |

In the **Hallertau**, spring work started around March 20th and was finished by the middle of April. The hops showed strong and healthy shoots. The cold spell during the first half of May which resulted in **Snowfall** and **Nightfrost** on May 10th, retarded growth. A very heavy infestation of **Maybugs** in 1953 necessitated extensive measures of control.

Acreage, Yield and Production 1952 and 1953

| | Acreage 1952 Acres | Yield Pounds | Production 1952 Pounds | Acreage 1953 Acres | Yield Pounds | Production 1953 Pounds |
|---------------------------------|--------------------------|-----------------|------------------------------|--------------------------|-----------------|------------------------------|
| Hallertau | 12,496 | 1,279 | 15,983,350 | 13,919 | 1,986 | 27,645,023 |
| Spalt | 2,093 | 1,106 | 2,314,830 | 2,256 | 1,745 | 3,936,644 |
| Hersbruck | 1,530 | 1,081 | 1,653,450 | 1,846 | 1,523 | 2,810,975 |
| Jura | 227 | 806 | 182,982 | 356 | 1,268 | 451,392 |
| Bavaria | 16,346 | 1,232 | 20,134,612 | 18,377 | 1,896 | 34,844,034 |
| Tettwang | 1,557 | 1,395 | 2,171,531 | 1,786 | 1,623 | 2,899,159 |
| R. H. W. | 558 | 899 | 501,547 | 675 | 952 | 642,420 |
| Baden | 49 | 1,471 | 72,090 | 96 | 1,470 | 141,094 |
| Rheinpfalz | 99 | 707 | 69,996 | 74 | 1,758 | 130,071 |
| Germany | 18,609 | 1,233 | 22,949,776 | 21,008 | 1,840 | 38,656,778**) |
| Saaz (Zatec) | | | | | | |
| Auscha (Ustek) | | | | | | |
| Other Districts | | | | | | |
| Czechoslovakia | 20,509 | 398 | 8,157,020 | 22,239 | 520 | 11,574,150 |
| Alsace | 2,471 | 1,249 | 3,086,440 | 2,545 | 1,862 | 4,739,890 |
| Dep. Côte d'or | 432 | 383 | 165,345 | 581 | 379 | 220,460 |
| Northern France | 556 | 1,685 | 936,955 | 432 | 2,041 | 881,840 |
| Lorraine | 74 | 596 | 44,092 | 74 | 745 | 55,115 |
| France | 3,533 | 1,198 | 4,232,832 | 3,632 | 1,624 | 5,897,305 |
| Alost | 531 | 1,785 | 947,978 | 581 | 1,694 | 984,354 |
| Poperinghe | 1,125 | 1,337 | 1,504,640 | 1,248 | 1,650 | 2,059,647 |
| Vodelée | 17 | 1,167 | 19,841 | 17 | 1,426 | 24,251 |
| Belgium | 1,673 | 1,478 | 2,472,459 | 1,846 | 1,662 | 3,068,252 |
| Slovenia | 3,778 | 679 | 2,563,950 | 3,958 | 934 | 3,696,673 |
| Backa | 445 | 149 | 66,138 | 445 | 1,179 | 524,695 |
| Jugoslavia | 4,225 | 623 | 2,630,088 | 4,403 | 959 | 4,221,368 |
| Austria | 22 | 521 | 12,125 | 40 | 882 | 35,274*) |
| Spain | 707 | 405 | 286,598 | 741 | 495 | 366,515 |
| Sweden | | | | 22 | 927 | 20,393 |
| Switzerland | 15 | 1,028 | 15,432 | 20 | 1,460 | 29,211 |
| Poland | 1,483 | 669 | 992,070*) | 1,483 | 803 | 1,190,484 |
| U S S R | 6,178 | 892 | 5,511,500*) | 6,178 | 892 | 5,511,500*) |
| Continent | 56,954 | 830 | 47,259,900 | 61,612 | 1,145 | 70,571,230 |
| Kent | 12,479 | 1,429 | 17,833,561 | 12,236 | 1,464 | 17,920,422 |
| Hants | 667 | 1,433 | 955,694 | 671 | 1,336 | 896,280 |
| Surrey | 121 | 1,309 | 158,400 | 121 | 1,232 | 149,031 |
| Sussex | 2,095 | 1,148 | 2,405,439 | 2,143 | 1,338 | 2,868,074 |
| Hereford | 4,715 | 1,502 | 7,081,947 | 4,608 | 1,285 | 5,921,115 |
| Worcester | 2,145 | 1,431 | 3,070,126 | 2,101 | 1,281 | 2,691,486 |
| Other Counties | 54 | 2,151 | 116,182 | 52 | 1,581 | 82,231 |
| England | 22,276 | 1,420 | 31,621,349 | 21,932 | 1,392 | 30,528,639 |
| Europe | 79,230 | 996 | 78,881,249 | 83,544 | 1,210 | 101,099,869 |
| Washington | 14,912 | 1,734 | 25,852,021 | 13,509 | 1,634 | 22,072,000 |
| Oregon | 12,810 | 1,309 | 16,767,967 | 7,095 | 968 | 6,868,000 |
| California | 9,007 | 1,674 | 15,075,055 | 6,272 | 1,532 | 9,608,000 |
| Idaho | 1,601 | 2,229 | 3,568,035 | 1,493 | 2,180 | 3,255,000 |
| USA | 38,330 | 1,598 | 61,263,078 | 28,369 | 1,473 | 41,803,000 |
| Quebec | 22 | | | } 50 | 262 | 13,104 |
| Ontario | 92 | | | | 934 | 176 |
| Brit. Columbia | 1,551 | | | 984 | 1,686 | 1,659,504 |
| Canada | 1,665 | 1,502 | 2,500,016*) | | | |
| Tasmania | 1,310 | 1,310 | 1,716,171 | 1,296 | 2,249 | 2,914,240 |
| Victoria | 249 | 1,374 | 342,044 | 275 | 1,996 | 548,800 |
| Australia | 1,559 | 1,320 | 2,058,215*) | 1,571 | 2,204 | 3,463,040 |
| New Zealand | 615 | 1,489 | 916,011*) | 720 | 1,431 | 1,030,400 |
| Japan | 1,878 | 991 | 1,860,683 | 1,878 | 823 | 1,545,600 |
| Manchuria | 247 | 669 | 165,345*) | 247 | 669 | 165,345*) |
| Argentina | 191 | 519 | 99,207*) | 319 | 525 | 167,550 |
| South-Africa | 470 | 586 | 275,575*) | 331 | 1,144 | 378,530 |
| Total | 124,185 | 1,192 | 148,019,379 | 117,963 | 1,283 | 151,312,838 |

*) = estimate

**) = Official Weighings on May 26th, 1954

Warmer weather beginning in the middle of May with sometimes hot spells and occasional rainfalls benefitted the development of the hops. Early cut gardens in some parts had already attained half the height of the trellises and began to show laterals whereas the average height of growth was about 8 to 10 feet.

The plants were overhanging the trellises in part already in June, and late uncovered gardens had offset the delay in growth. First **Burrs** became noticeable in early cut gardens and were favoured by humidity and warmth.

There were considerable precipitations during the end of June/beginning of July and gardens became waterlogged in some areas. The warm, humid and sultry weather continued to accelerate the vegetative development of the plants. Burrs appeared everywhere and early uncovered gardens were not only in full **Bloom** at this time but already showed the first sporadic **Cones**. Laterals were extremely long everywhere and the growth of the plants had not yet ceased in spite of the start of the bloom. Burrs developed generally in July under high temperatures and plentiful rainfalls. The irregular weather changed to drier and warmer by the beginning of August which was favourable for the sizing of the cones. Cones and bloom appeared sometimes side by side on the vines as weather conditions continued to favour new sets of burrs. Late uncovered gardens generally showed the best development.

Picking started sporadically on August 21st, became general on August 24th and was favoured by good weather. The quality of the Hallertau hops crop 1953 was distinguished by a very fine and brilliant colour whereas the size of the cones was somewhat irregular. Light lupulin was amply present and the aroma was mild and fine. Clean picking was to be noted in general.

Plants had wintered well in the **District of Spalt** but there was some **Root Rot**. The **Uncovering** and **Cutting** was finished by the end of April. The plants had a good start and there were only sporadically slight damages by **Fleas**. The cold spell in the beginning of May retarded growth which, however, was offset by warm weather in the second half of this month. Early uncovered gardens showed already a height of 7 to 10 feet.

There were plentiful rains in June, sometimes thunderstorms and even cloud-bursts. The growth of the hops in Spalt was especially favoured by the abundant humidity. The plants had reached the height of the trellises generally by the end of June and were sometimes overhanging already at this time. Long laterals were plentiful and the general aspect of the crop was healthy. Sufficient humidity and sunshine in July were favourable for the development of **Bloom** and sultry weather in August benefitted the sizing of the cones.

Picking began generally on August 24th. Hot summer weather and dryness favoured the **Ripening** of the hops. The crop came well under cover although **Pickers** were sometimes scarce.

Spalt hops crop 1953 were rather uniform in size. The colour on the average was not so uniformly green as the year before but the hops showed a good content of lupulin and a fine aroma. Cleanliness of picking was not always quite satisfactory as a consequence of the abundant harvest and lack of labour.

Tettang. The month of March was drier than normal so that spring work was quickly finished. Relieving rains in April as well as rain and warm weather in the beginning of May benefitted the plants. Control of **Grubworms** necessitated much work in some parts. **Nightfrosts** during the first half of May did no much damage, whereas hot weather during the second half of that month resulted in a luxuriant growth. The plants had reached half the height of the trellises by this time. Heavy thunderstorms resulted in considerable rainfall which turned to **Hail** in local areas without any great damage.

The plants had reached three quarters of their height by the beginning of June. There was abnormal rainfall in June and not enough sunshine for the development of the hops. **Downy Mildew** was more in evidence than the year before and had to be controlled. The plants reached the height of the trellises and were sometimes overhanging by the second half of June and there was an abundant growth of **Laterals**. Exceptionally early **Burrs** were sometimes noticeable.

Abundant rainfalls continued during July so that gardens on heavy soils began to suffer whereas yards on lighter soils showed better aspects. The hops were overhanging the trellises generally by the middle of July and were in full **Bloom** at this time. The much hoped for dry and sunshiny weather appeared only during the second half of July and favoured the **Sizing of the Cones** which was generally finished by the first half of August. At this time, however, there were many plants which showed bloom only. **Picking** began on August 24th.

The cones of the Tettang hops were especially irregular in size and considerably greater than in 1952. The colour was sometimes not uniformly green but the aroma was mild. Cleanliness of picking was not always up to expectations.

Rottenburg, Herrenberg, Weilderstadt. The winter 1952/53 brought abundant snowfalls which continued until March. The weather then became dry and favoured spring work which began during the last decade of March. Some rainfalls under mostly dry and sunshiny weather in the beginning of May favoured the plants which showed a good and healthy aspect. Cooler weather by the middle of May resulted in local Snowfalls on higher locations. Warm weather and rainfalls during the second half of May benefitted growth. Thunderstorms with local Hail did some damage.

At this time the plants were sometimes already ten feet high. The weather became colder during the end of May/beginning of June. There were, however, sufficient rainfalls and the plants continued their good development after warmer weather began to set in again. June was warm and very rainy. The plants showed a luxuriant growth. Many gardens had already reached the height of the trellises and a very good development of laterals was noticeable. Early gardens were in full Bloom by the end of July while late varieties were in Burrs. The set of cones appeared on early varieties during the first half of August while late hops were in full bloom at that time. The dry and warm weather in August favoured the Sizing of the Cones. The harvest began on September 1st, was in full swing by September 5th and was finished by the middle of that month.

The hops were rather uniform in growth, almost throughout of green colour, of fine aroma and clean picking.

Hersbrucker Gebirge. Spring work began by the middle of March and was favoured by warm and dry weather. By the beginning of May it became evident that early uncovered gardens had considerably gained in growth. This development was retarded under cold weather in the first half of May. There were local Snowfalls but no Frost Damages. The weather turned very warm in the second half of May and the plants recuperated. Many gardens already had reached half of the height of the trellises at this time, in spite of limited rainfalls. Red Spider became dangerous at times and had to be controlled.

Cooler weather by the end of May/beginning of June was followed by a warm spell. The general aspect of the crop was not uniform; early uncovered gardens showed the best development.

Much rain fell in June but the weather was mostly warm so that the plants reached the height of the trellises and showed a remarkable growth of laterals. The first Burrs were noticeable in early gardens. High temperatures and humidity in July further favoured development and notably the growth of laterals. Burrs were general on early varieties. The set of cones in early gardens appeared by the end of July whereas late varieties at this time were in Bloom. The sultry weather continued through August. Cones appeared side by side with burrs especially on early varieties whereas late varieties showed a more uniform development. Picking began sporadically on August 19th but was general only by the beginning of September.

The quality of Hersbruck hops crop 1953 was good and cones were rather uniform in size. The colour was not as green as the year before. Lupulin was amply present. Hops were better dried than the year before but the cleanliness of picking was sometimes not up to expectations.

The annual official survey of the new crop resulted in an estimate of from 29,000,000 lbs./31,200,000 lbs. for 1953. Official figures, however, showed a final result of 38,656,778 lbs. By this even the upper limit of the estimate has been surpassed by about 24%. This result was scarcely anticipated in spite of the record growth of crop 1953.

Crop estimate
1953

Bitter values of
crop 1953

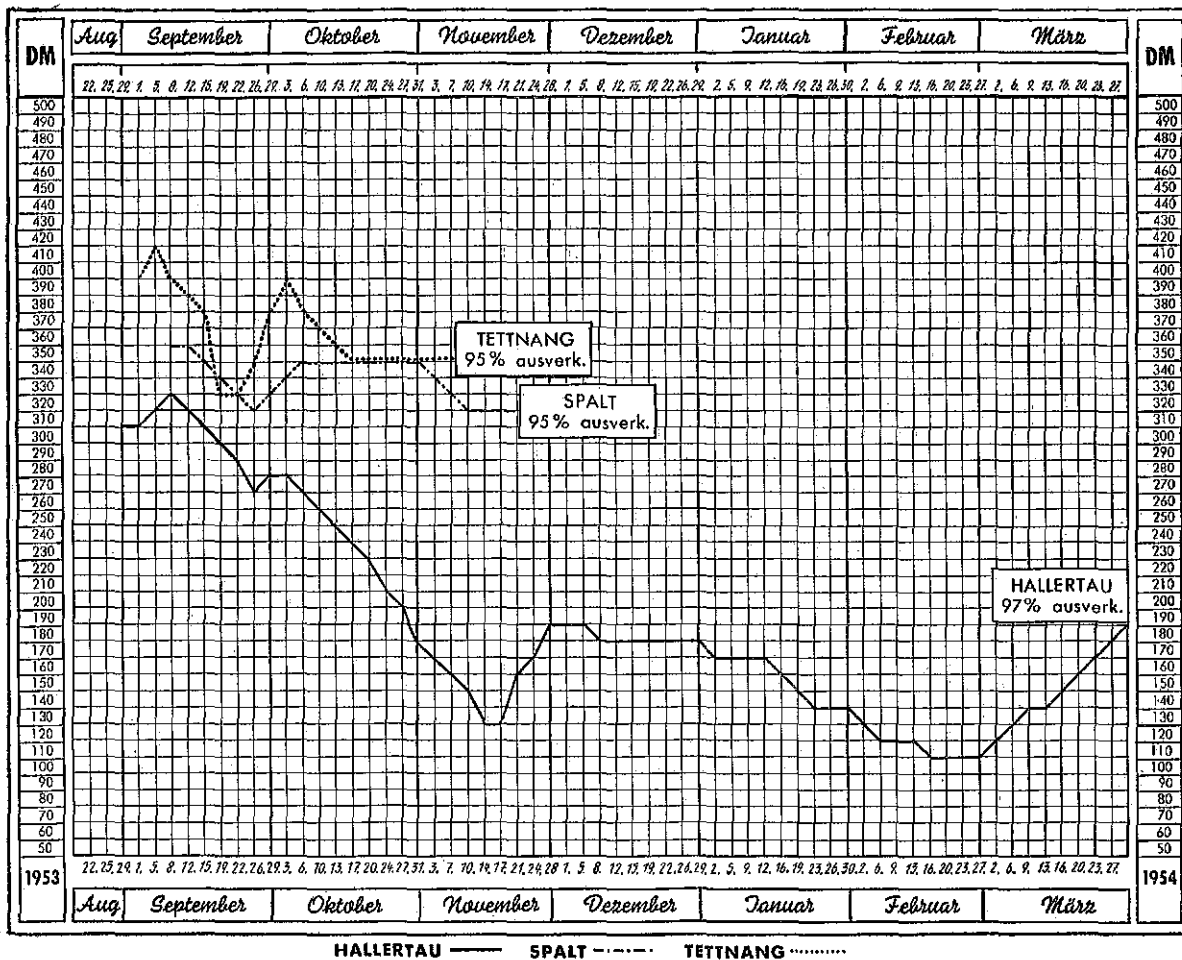
| Origin | Total resin content anhydric | Soft Resins % | Humulon % | Lupulon+ Fractions of soft resin % | Hard resins % | Bitter value Wöllmer | | | | |
|--------------------|------------------------------|---------------|-----------|------------------------------------|---------------|----------------------|-------|------|-------|-----|
| Hallertau | 17.67 | 14.92 | 84.44 | 5.96 | 33.73 | 8.96 | 50.71 | 2.75 | 15.56 | 7.0 |
| Au/Hallertau | 17.63 | 14.05 | 79.70 | 6.22 | 35.29 | 7.83 | 44.41 | 3.58 | 20.30 | 7.1 |
| Wolnzach/Hallertau | 18.94 | 13.78 | 72.76 | 6.33 | 33.42 | 7.45 | 39.34 | 5.16 | 27.24 | 7.2 |
| Mainburg/Hallertau | 17.31 | 13.83 | 79.90 | 5.77 | 33.33 | 8.06 | 46.57 | 3.48 | 20.10 | 6.7 |
| Spalt | 16.84 | 13.94 | 82.78 | 5.40 | 32.07 | 8.54 | 50.71 | 2.90 | 17.22 | 6.4 |
| Tettwang | 17.17 | 14.79 | 86.14 | 5.81 | 33.84 | 8.98 | 52.30 | 2.38 | 13.86 | 6.8 |
| Württemberg | 15.77 | 13.27 | 84.15 | 5.94 | 37.67 | 7.33 | 46.48 | 2.50 | 15.85 | 6.8 |
| Gebirg | 18.28 | 15.03 | 82.22 | 7.08 | 38.73 | 7.95 | 43.49 | 3.25 | 17.78 | 8.0 |
| Jura | 18.22 | 14.84 | 81.45 | 5.29 | 29.03 | 9.55 | 52.42 | 3.38 | 18.55 | 6.4 |
| Alsace | 17.36 | 15.43 | 88.88 | 8.77 | 50.52 | 6.66 | 38.36 | 1.93 | 11.12 | 9.5 |
| Saaz | 14.41 | 12.31 | 85.43 | 4.38 | 30.40 | 7.93 | 55.03 | 2.10 | 14.57 | 5.3 |
| Jugoslavia | 17.23 | 15.34 | 88.10 | 7.73 | 43.15 | 7.64 | 45.91 | 1.86 | 10.94 | 8.5 |
| English Fuggles | 17.92 | 16.31 | 91.02 | 2.69 | 15.01 | 13.62 | 76.01 | 1.61 | 8.98 | 4.2 |
| US Seedless Yakima | 16.92 | 14.02 | 82.86 | 5.86 | 34.63 | 8.16 | 48.23 | 2.90 | 17.14 | 6.8 |
| US Fuggles | 16.60 | 12.93 | 77.89 | 5.03 | 30.30 | 7.90 | 47.59 | 3.67 | 22.11 | 5.9 |

Hop purchases crop 1953

Quotations for hops of the old crop 1952 continued to decrease constantly since the beginning of 1953, while all indications pointed more and more to a big new crop 1953. This situation did leave a considerable impression upon all circles concerned. A buyer's market was generally expected and anticipation of prices centered mostly on a basis of DM 300.—/400.— per 50 kilos. There was considerable activity at this price level during the beginning of the new season, as important demand from the home market was coupled with considerable interest for exports. About 27,500,000 lbs. had changed hands until the end of October 1953.

Quotations in the districts of Spalt and Tettwang were maintained on a level still remunerative to farmers, certain oscillations notwithstanding. Prices, however, in other districts of production, most especially in the Hallertau, showed a constant downward trend. Less active demand by the middle of October resulted in a decline of prices. This general trend continued until February 1954 with only a small interruption during the second half of November 1953. Prices tumbled to a level which constituted a new market feature since the finish of the war. Important quantities were sold on this basis, which was considerably under cost of production. Substantial purchases for shipment to the *Deutsche Demokratische Republik (D. D. R.)* during the first half of March 1954 coupled with a somewhat more favourable development of prices resulted in a widespread liquidation of stocks both in the Hallertau and the Hersbrucker Gebirge.

Development of quotations crop 1953



Tettwang. Purchases began actively on a basis of DM 380.—/400.— whereas by the beginning of September breweries paid up to DM 420.— so that trading circles had to observe a certain reserve. The market seemed to stabilize itself during the second half of September on the basis of DM 320.—/340.— under active purchasing, until new considerable demand made quotations rise to DM 400.— again. This top level was maintained for a short time only and it became possible to sell out this district under somewhat weakening quotations until the middle of October. Last remaining lots changed hands until the middle of November.

Spalt. In the beginning of the season, purchasing was difficult as farmers asked about DM 400.—. Trade was slow for this reason and only small quantities were sold during the first half of September under slowly falling quotations on the basis of DM 340.—/360.—. Farmers were somewhat more ready to sell by the middle of September on the basis of DM 320.—/340.— so that trading rapidly became active. Parallel to the situation in the district of Tettwang, the market experienced an increase at the close of the month and prices reached DM 350.— which

quotation remained valid during October. More than 90% of the crop had been sold and officially weighed until October 19th.

There was no regular market activity in Spalt as well as in Tettwang for lack of hops by the middle of October. In Spalt, trading became slow at this time as last remaining lots changed into second hands on a basis of DM 300.—/320.—.

Hallertau. Trading activities opened sluggishly by the end of August at prices about DM 300.—. This level remained practically unchanged until the middle of September after a light initial upward movement. After this date quotations maintained their downward trend in spite of active trading and reached DM 260.—/280.— by the end of September 1953, DM 240.—/260.— in mid-October and fell until DM 200.—/220.— at the end of October. After an almost complete standstill of trading until the middle of November, when prices reached the lowest level of DM 120.—/140.—, quotations firmed and reached DM 190.— by the end of the month under more active demand. After that prices decreased again gradually in December 1953 as well as during January/February 1954. Demand increased on this level so that the district was sold out with the exception of small lots until the end of March 1954.

Hersbrucker Gebirge. First lots changed hands in the beginning of September on a basis of DM 270.—/280.— but trade was very slow as the harvest was drawn out until the middle of September. At that time farmers consigned most lots to commission houses as they did not want to sell in the expectation of higher prices. Trade became active only about the end of September when prices were already down to DM 220.—/240.—. Reflecting lower quotations in the Hallertau, prices had to recede during October and reached DM 160.—/170.— by the end of that month. Considerable stocks in hands of commission houses influenced quotations further as demand became constantly less active and prices reached a level of DM 110.—/130.— by the end of November. Occasional increases in demand have only resulted in insignificant changes of this basis.

Wurttemberg. The distance in location between this small district of production and the big Bavarian centers of hop growing made itself adversely felt. Producers in Wurttemberg maintained too strongly their ideas of prices in spite of insignificant demand, so that there was practically no trading until the end of September. Slow activity became noticeable only by the middle of October on a price level of DM 210.—/230.—. Demand remained slack and prospective purchasers were inclined to cover their needs in the Hallertau at attractive quotations. Prices were forced down and as farmers had practically no possibility of storage, part of existing stocks were taken over by a newly established cooperative. It has been possible to dispose of practically all stocks until March 1954 when last lots were sold at DM 130.—/140.—. There are only insignificant remaining quantities.

Nürnberg Market

Trading activities on the Nürnberg market were somewhat limited in 1953. Daily decreasing quotations restrained local dealers as purchasing from farmers was generally more attractive. This refers especially to Hallertau hops whereas the situation was somewhat different for Hersbruck, Spalt and Wurttemberg hops. According to quality the following prices remained relatively stable since the end of March 1954: Hallertau DM 170.—/210.—, Tettwang DM 260.—/300.—, Hersbruck DM 130.—/145.—, Wurttemberg DM 130.—/145.—.

Market Survey

It will be understandable that the movement of crop 1953, which was about 70% bigger than crop 1952, has not been possible without difficulties. About two thirds of the crop could be disposed of at prices which were still acceptable to farmers. More than 100,000 cwts., however, had to be sold under cost of production. This situation had last been experienced in 1931. The German hop industry has turned from a seller's market to a buyer's market during the season 1953/54.

The excess of crop 1953 had to find channels into export as the home breweries were not in a position to take over these quantities. Exports increased about 70% and it has thus been possible to move the bulk of the German hop crop 1953.

It may be estimated that most home breweries are amply covered for their necessities so that a strong demand from German breweries may scarcely be expected even if the coming crop 1954 should be less ample. If moderate prices should continue to prevail it may be quite possible to dispose of considerable hop quantities in the future as well as during the last season.

This possibility and the expectation that record hop crops as in 1953 are not going to repeat themselves may have induced German hop farmers to limit reductions in acreage.

The disappointing development of prices for crop 1953 increased activities for a marketing agreement by farmers. The Union of European Hop Farmers as top organisation of all hop farmers' unions in Western Europe went as far as demanding a coordination of the whole European hop production and the creation of national marketing agreements. It seems scarcely possible, however, that either one or the other of these measures will be realised under present economical conditions.

Marketing Agreement

On September 8th, 1953, the *D. H. V. G. (Deutsche Hopfenverkehrs-Gesellschaft)* requested receivership to avoid bankruptcy. The Court of Nuremberg denied this application on October 8th and bankruptcy proceedings were opened.

D. H. V. G.

The final reason within the chain of events which resulted in the failure of the D.H.V.G. may have been the fact that this organisation purchased considerable quantities of hops at high prices in September 1952 and did not take advantage of sales' possibilities in time. The falling market until the new crop 1953 resulted in sensible losses.

The bankruptcy proceedings have not yet come to a close. The new warehouse of the D.H.V.G. which was completed in August 1952 has been sold to a department store and is no longer available for the processing of hops.

In order to avoid market pressures by offers for excess quantities of hops there have been organised so-called sales' cooperatives in various German districts of production, which are united under the name of *Genossenschaftliche Hopfenverwertungszentrale m.b.H., Nürnberg*. Present informations indicate that these cooperatives intend to trade with German hop dealers exclusively. A state's guarantee of DM 1,500,000.— has been requested from the Bavarian Government in order to ensure the functioning of this organisation. The future development of this movement remains to be seen.

Sales' Co-operatives

Mainburg in the Hallertau had been selected as the site for the planned new institute by the Union of Hop Farmers. Total expenses for the new construction were set at about DM 650,000.—. This amount was expected to be covered by a special levy of DM 5.— per 50 kilos on hops crop 1953 to be paid by farmers. This levy, however, has been deviated in the autumn of 1953 in favour of the new sales' cooperatives. Plans for a new institute, therefore, appear to have been shelved for the time being.

New Institute for Hop Research

According to a letter of the Ministry of Finances, dated April 14th 1954, (IV S 4216—124/53) sales of processed hops by farmers are now subject to the general rate of 4%.

Turnover Tax

According to the same letter, the rate of 1% is to be applied if dealers only re-kiln, re-sulphur, re-pack or put into drums processed hops purchased from local dealers. The rate of 4%, however, has to be paid if hops are re-cleaned, re-picked or sulphured.

After discussion with farmers' representatives, the *Bundes-Ernährungsministerium* discontinued export controls for hops. Export licences, therefore, are no longer required for hops according to a decree No. III B—Z 2524—448/53 of the Ministry of Finances, dated September 16th, 1953.

Export Licences

Only limited quantities of hops crop 1953 were imported in view of the abundant home crop. Imports from September 1st, 1953 to April 30th, 1954 were as follows:

German Hop Imports Crop 1953

| | |
|--------------------------|---------------------|
| Belgium | 6,834 lbs. |
| France | 41,006 „ |
| Great Britain | 3,086 „ |
| Italy | 12,787 „ |
| Jugoslavia | 2,645 „ |
| Netherlands | 27,337 „ |
| Czechoslovakia | 166,447 „ |
| USA. | 27,558 „ |
| Total | <u>287,700 lbs.</u> |

German Hop Exports 1953

The record shipments of hops for exports were distributed as follows:

| Exports of German Hops Crop 1953 | | | | | | |
|----------------------------------|------------------|--------------------------------|---------------------------------|-----------|-------------------|-----------|
| September 1953 — April 1954 | | | | | | |
| | lbs. | lbs. | | lbs. | lbs. | |
| Belgium | 924,168 | 8,298,996 | b. f. | 4,759,952 | 4,925,297 | 8,298,996 |
| Denmark | 838,850 | | Venezuela | 165,345 | | |
| Finland | 114,419 | | AMERICA | | | |
| France | 883,824 | | Abyssinia | 13,228 | | |
| Greece | 66,138 | | Algiers | 14,330 | | |
| Great Britain | 227,735 | | Congo | 59,524 | | |
| Iceland | 5,512 | | French Morocco | 78,925 | | |
| Italy | 551,370 | | French West Africa | 44,092 | | |
| Canary Islands | 7,055 | | French Equat. Africa | 882 | | |
| Luxembourg | 166,227 | | Kenya-Uganda | 15,652 | | |
| Netherlands | 1,164,029 | | Lybia | 2,205 | | |
| Norway | 270,063 | | Portug. West Africa | 6,613 | | |
| Austria | 1,173,068 | | Union of South Africa | 11,905 | | |
| Portugal | 84,657 | | South West Africa | 6,173 | | |
| Rumania | 203,925 | | Tanganyika | 2,645 | | |
| Saar | 101,632 | | Tanger | 3,307 | | |
| Sweden | 781,090 | | Tunisia | 24,251 | | |
| Switzerland | 572,535 | | AFRICA | | | |
| Triest | 8,377 | | China | 19,841 | | |
| Hungary | 154,322 | | Cyprus | 2,205 | | |
| EUROPE | | Hongkong | 36,376 | | | |
| Argentina | 274,473 | India | 37,478 | | | |
| Bolivia | 25,353 | Indochina (Viet Nam) | 154,322 | | | |
| Brazil | 192,241 | Indonesia | 81,791 | | | |
| Brit. West India | 24,692 | Iran | 14,550 | | | |
| Canada | 14,109 | Israel | 73,854 | | | |
| Chile | 33,510 | Japan | 198,194 | | | |
| Columbia | 400,135 | Libanon | 6,614 | | | |
| Costa Rica | 220 | Malayan States | 31,746 | | | |
| Ecuador | 6,614 | Philippine Isl. | 69,886 | | | |
| Guatemala | 3,527 | Thailand | 14,330 | | | |
| Mexico | 1,102 | Turkey | 113,316 | | | |
| Peru | 20,282 | ASIA | | | | |
| Uruguay | 48,502 | Australia | 1,543 | | | |
| USA | 3,715,192 | AUSTRALIA | | | | |
| c. f. | 4,759,952 | 8,298,996 | Total | | 14,364,071 | |

Unit Size of Farms

A survey about the unit size of hop farms in the district of Hersbrucker Gebirge has been published by the Farmers Union as follows:

| County | Hop-Acreage acres | Number of Hop Yards | Average acreage of Hop Yards acres | Average of total agri- cultural acreage per farm acres | Hop acreage per farm acres | Hop acreage in % of total agricultural acreage |
|---------------------------------|----------------------|------------------------|---|---|----------------------------------|---|
| Hersbruck | 574.95 | 1294 | 0.44 | 17.12 | 1.06 | 6.13 |
| Lauf | 667.76 | 1305 | 0.51 | 18.31 | 1.01 | 5.64 |
| Erlangen | 131.85 | 234 | 0.56 | 20.00 | 0.84 | 4.22 |
| Forchheim | 88.23 | 164 | 0.54 | 27.75 | 0.67 | 2.41 |
| Nürnberg-Land | 44.08 | 123 | 0.35 | 20.70 | 0.52 | 2.47 |
| Pegnitz | 18.68 | 40 | 0.46 | 27.97 | 0.57 | 2.02 |
| Sulzbach-Rosenberg | 3.33 | 7 | 0.47 | 30.64 | 0.67 | 2.18 |
| District Hersbrucker Gebirge | 1,528.88 | 3167 | 0.48 | 18.95 | 0.81 | 4.37 |

This compilation shows that farms are generally small and the hop acreage is only a limited part of the farms. This is a very sound economical basis for hop production. It is especially remarkable, however, that the average size of hop gardens is under 0.6 acres which makes mechanization rather difficult.

The acreage in Bavaria has been verified according to a decree of the *Bayerische Staatsministerium fuer Ernährung, Landwirtschaft und Forsten* No. 6108a 40, dated March 6th, 1953. Figures for other districts are those utilized for the official crop estimate 1953. Hop acreage in Germany 1953 was as follows:

**Hop Acreage
in Germany
1953**

| District | 1939 Acreage | 1953 | | |
|------------------|---------------------|---------------------|--------------------|---------------------|
| | | Existing acreage | Additional acreage | Total |
| Hallertau | 11,317 acres | 12,516 acres | 1,403 acres | 13,919 acres |
| Spalt | 2,276 " | 2,063 " | 193 " | 2,256 " |
| Hersbruck | 2,118 " | 1,544 " | 302 " | 1,846 " |
| Jura | 200 " | 230 " | 126 " | 356 " |
| Tettngang*) | — | 22 " | 5 " | 27 " |
| Aischgrund | 200 " 1) | 12 " | — | 12 " |
| Other Districts | — | 18 " | — | 18 " |
| Bavaria | 16,111 acres | 16,405 acres | 2,029 acres | 18,434 acres |
| Wurttemberg-RHW. | 1,223 " | 561 " | 114 " | 675 " |
| Tettngang**) | 1,636 " | 1,522 " | 237 " | 1,759 " |
| Baden | 440 " | 79 " | 17 " | 96 " |
| Rheinland-Pfalz | 150 " | 70 " | 4 " | 74 " |
| Other Districts | — | 15 " | — | 15 " |
| Total | 19,560 acres | 18,652 acres | 2,401 acres | 21,053 acres |

*) areas in Bavaria **) except areas in Bavaria 1) 1938

The small acreage outside of Bavaria and not within a recognized district of production is composed by 2.5 acres each in the counties of Bitburg, Landau and Speyer (*Rheinland-Pfalz*) as well as 2.5 acres in the district of Aachen and 5 acres in the district of Detmold (*Nordrhein-Westfalen*).

The reliability of figures relating to hop acreage in Germany has been questioned from many sides in consequence of the record crop 1953. In the following table we have compared the yields per acre according to the highest crop estimate and actually attained results according to official weighings. For this compilation, the existing acreage has been considered as fully bearing and the new plantings as making half a crop:

| District | Yield per acre | |
|---------------------|-------------------------|--------------|
| | Upper limit of estimate | Actual Yield |
| Hallertau | 1,670 lbs. | 2,100 lbs. |
| Spalt | 1,430 " | 1,830 " |
| Hersbrucker Gebirge | 1,430 " | 1,650 " |
| Jura | 1,130 " | 1,515 " |
| Tettngang | 1,390 " | 1,740 " |
| Wurttemberg-RHW. | 1,070 " | 1,040 " |
| Pfalz | 1,470 " | 1,740 " |
| Baden | 1,010 " | 1,605 " |

This table shows that yields attained are within the scope of practical results. It has been not too rare that hop yards in the Hallertau brought yields extremely above average up to 2,900/3,100 lbs. per acre. Under these circumstances, acreages according to statistics published up to now may be considered susceptible to small adjustments only.

Acreage 1954. Authorities decided in Bonn on October 1st, 1953 that the hop acreage is not to be increased in 1954. Existing acreages have been distributed among the different *Länder* as follows:

| | |
|-----------------------------|---------------------|
| Bavaria | 18,433 acres |
| Wurttemberg/Baden | 2,471 " |
| Rheinland/Pfalz | 77 " |
| | <u>20,981 acres</u> |

Acreage in full bearing may be expected to be 21,000 acres in 1954. New plantings are practically non-existent and subject to approval according to § 8 of the decree dated March 19th, 1951 (BGBl. 1 S 227).

**Deutsche
Demokratische
Republik DDR.**

Hop growing in the DDR. continues to progress. Radiating from the University of Jena, where the first experiments were conducted, the cultivation of hops has spread into the valley of the river Saale. Further new plantings are reported from the district of Nimbschen, Saxony.

No data are available about the acreage and yields of the hop gardens. It seems that hop growing has reached certain proportions already, but it is said that yields are not yet satisfactory. Hop growing exacts utmost efforts throughout the season and it is only to be expected that difficulties will arise during the introduction of this culture.

Deliveries of German hops to breweries within the DDR. have been considerably increased as against the year before.

Shipments of hops from Western Germany to the DDR. had been set at a value of DM 9,000,000.— for the year 1954 according to the agreement dated December 18th, 1953 (*Bundesanzeiger* Nr. 247 of December 23rd, 1953). About DM 6,000,000.— of this amount have been utilized for hops crop 1953. Contracts totalling 960,000 lbs. have been signed in September 1953 during the Leipzig Fair and in December 1953. Deliveries against these contracts had already been made and additional orders for about 165,000 lbs. were placed in February/March 1954.

In contrast to last year there are no more public bids for hops. Export licences are now subject to the situation of the clearing with the DDR., according to a decree of December 31st, 1953 (*Bundesanzeiger* Nr. 4 dated January 7th, 1954).

Czechoslovakia

The winter of 1952/53 was mild and brought sufficient precipitations to increase soil moisture. Spring work was done during April under good weather conditions. Cool weather and **Frosts** at the beginning of May with occasional snowfalls retarded growth which, however, was able to develop satisfactorily under warm weather during the second half of May and June.

Fleas were frequent in some parts where control measures were late. Dusting against this pest has been done from airplanes later on. **Aphids** as well as **Red Spider** were effectively controlled with modern sprayings. **Downy Mildew** found good conditions during the warm and humid weather in 1953 so that control became necessary.

The plants reached the height of the trellises at the beginning of July. At this time the weather turned somewhat drier, although cooler at the same time, so that **Burrs** as well as **Bloom** were retarded in late uncovered gardens. Early uncovered gardens were in full bloom already in mid-July. In general, the plants had offset earlier retardation of growth and the general aspect of the gardens was more uniform. Growth was luxuriant in part and the hops were overhanging the trellises. Laterals were relatively plentiful. Sprayings against **Aphids** as well as **Downy Mildew** had to continue. The general stand of the crop was judged to be better in Auscha and Raudnitz than in Saaz.

Picking began somewhat later than usual. Yields were greater than the year before. Hops are handled centrally and paid according to classification in 7 grades at prices of Kc. 1,300.— to Kc. 2,300.— per 50 kilos. Quantities delivered over and above the prescribed minimum yield receive a bonus from Kc. 100.— to Kc. 400.— for the three best grades.

In consequence of the general record harvest in Europe, exports of Czechoslovakian hops have been somewhat retarded but these hops nevertheless obtained the highest prices in the world market. The whole crop was sold out by the end of March 1954.

Jugoslavia

The hops had wintered well in the district of Sanntal (Slovenia). Spring work began in April under dry weather, and rain fell only by the end of that month. Weather conditions were similar to the general European situation so that the hops grew very well under intermittent rain-fall and sunshine. Some **Frost Damage** in May was offset by later development. Precipitations were distributed as follows:

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|-----|------|------|-------|-------|------|------|-------|
| 93 | 39 | 1.7 | 71 | 111 | 120 | 108 | 159.8 | 169 | 93.6 | 34 | 18 mm |

Preventive sprayings against **Downy Mildew** were effected two or three times on the average. **Aphids** appeared in some districts by the end of May and had to be controlled. The hops reached the height of the poles by the end of June/beginning of July and showed a luxuriant overhang. Late uncovered gardens did not show such a good growth but had numerous shorter laterals. Some appearance of **Red Spider** was noted shortly before harvest.

Picking began sporadically on August 15th, was in full swing on August 20th and finished already on September 5th as there was no scarcity of pickers. Weather conditions during harvest were good. The quality of the crop was estimated as 55 % prime, 42 % medium and only 3 % off-grade.

All hops are handled by the Co-operative. Quotations follow the trend of world markets. Crop 1953 was rapidly sold out.

The Styrian hops crop 1953 were not so light-green as in 1952 and the cones were not so uniform as the year before. Fine lupulin of mild aroma was amply present.

After a mild winter, hops were off to a slow start in the spring of 1953 as March was cool and dry and April cool with some rains. Precipitations are indicated as follows:

Belgium

| District | Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------------|------|-------|-------|-------|------|------|------|------|-------|------|------|--------|
| Alost | 21.0 | 74.9 | 6.4 | 65.7 | 52.0 | 73.9 | 86.0 | 76.8 | 45.5 | 15.5 | 14.3 | 32.2mm |
| Poperinghe | 17.8 | 45.7 | 4.4 | 58.0 | 66.8 | 72.0 | 58.5 | 54.3 | 73.2 | 17.0 | 25.0 | 39.8mm |

The summer was not only very rainy but generally rather cool. Downy Mildew had to be controlled regularly. On the average 12—15 sprayings were applied. Pests were efficiently controlled by modern sprayings.

The plants reached the height of the trellises generally by the end of June and showed a luxuriant growth. Tettang and Hallertau plants brought well sized and ripened cones while Fuggles showed smaller cones in consequence of the elimination of the male plants. Picking began on September 1st and was finished within about three weeks under generally good weather conditions. A big crop was harvested and even new gardens brought more than half of a full yield.

Labour was plentiful in **Alost**. About 75% of hop yards in this district are planted with Hallertau vines. The crop was sold rather rapidly.

About two thirds of the hop yards in **Poperinghe** contain Hallertau vines while Fuggles comprise about one fourth of the acreage. Pickers were reluctant to handle these latter gardens.

In Poperinghe, prices for type Hallertau hops set in on the basis of bfrs. 3,300.— at the beginning of September and were practically maintained until October. From then on, quotations continued to fall and stood at bfrs. 1,800.— per 50 kilos by March 1954. There were abt. 20% of the crop unsold in Poperinghe at that date.

The following quantities of crop 1953 have been imported from September 1st, 1953 to March 31st, 1954:

| | | | |
|-------------------|----------------|--------------------------|----------------|
| France | 4,850 lbs. | b. f. | 1,297,407 lbs. |
| Austria | 11,023 " | Czechoslovakia | 838,409 " |
| Germany | 1,127,212 " | Jugoslavia | 84,216 " |
| USA. | 92,593 " | Netherlands | 441 " |
| England | 61,729 " | | 2,220,473 lbs. |
| c. f. | 1,297,407 lbs. | | |

The following exports are indicated for the time from September 1st, 1953 to March 31st, 1954:

| | | | |
|-------------------------|--------------|---------------------------------|--------------|
| Belgian Congo | 3,527 lbs. | b. f. | 263,009 lbs. |
| USA. | 55,115 " | Union of South Africa | 33,951 " |
| Tanger | 1,102 " | Netherlands | 18,960 " |
| England | 3,307 " | Germany | 8,598 " |
| Ireland | 3,307 " | Rumania | 13,228 " |
| Switzerland | 10,582 " | Kenya and Uganda | 2,204 " |
| Austria | 157,630 " | Southwest-Africa | 2,204 " |
| Denmark | 14,550 " | Malaya | 7,496 " |
| India | 13,889 " | | 349,650 lbs. |
| c. f. | 263,009 lbs. | | |

In **Alsace**, development of Downy Mildew was checked by dry spring weather. Preventive sprayings against this disease were effected 6—8 times. Generally, the weather was more humid than the year before as shown by the following table:

France

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|------|-------|-------|------|-------|------|------|---------|
| 9.1 | 47.3 | 7 | 57.3 | 56.1 | 183.7 | 159.3 | 30.4 | 51.6 | 22.1 | 10.8 | 23.4 mm |

On the average, the plant showed a rapid and healthy growth. Red Spider was especially noticeable and had to be controlled continually. The plants reached the height of the trellises by the beginning of July and showed a good overhang.

Picking began as usual on the first monday in September and was protracted by reason of the abundant crop. The quality of the Alsace hops was very good. Bitter values were higher than the year before but the colour was somewhat less green and cones were somewhat irregular.

The crop was estimated as about 50% first and 50% second quality. Trading circles purchased about one third of the total crop at prices of ffrs. 20,000.—/ffrs. 22,500.— per 50 kilos. All other hops were taken over by the Alsatian Co-operative which made a part-payment of ffrs. 12,000.—. Another instalment in June brought payments up to ffrs. 13,000.—/ffrs. 16,000.— according to quality. Disposal of these hops has not yet been fully effected.

In Flanders development of the hop gardens was subject to cold weather from April until mid-June. Pests were limited but Downy Mildew was a serious danger after June so that 15—20 sprayings had to be applied. The general stand of the crop was still somewhat irregular by the end of July but the harvest was plentiful. Picking went on from the end of August until September 20th under fine weather. Cones were smaller in size than normal but the colour was good and there were less seeds than formerly. The quality of the crop is estimated at 20% choicest, 60% prime and 20% medium.

Prices set in on a basis of ffrs. 20/22,000.— per 50 kilos at the beginning of September, but only abt. 25% of the crop were sold until October when quotations were down to ffrs. 15,000.—/ffrs. 20,000.—. Bigger quantities could be sold at receding prices so that only abt. 20% of the crop remained unsold by the beginning of March 1954. Quotations at that date were abt. ffrs. 8,500.—/12,000.—.

The elimination of male plants in this district has shown good results. Yields per acre are somewhat smaller than formerly as cones now are smaller in size. Another improvement in hop growing is being expected from an increased planting of type Hallertau hops which are imported from Belgium.

Hop Exports from France during the calendar year 1953 were as follows:

| Destination | Jan.—June 1953 lbs. | July—Dec. 1953 lbs. | 1953 Total lbs. |
|--|------------------------|------------------------|--------------------|
| Western Germany | — | 7,716 | 7,716 |
| Austria | 154,322 | 1,102 | 155,424 |
| Denmark | 1,102 | — | 1,102 |
| Spain | 77,602 | 97,884 | 175,486 |
| Finland | 17,637 | 13,007 | 30,644 |
| Italy | 9,039 | — | 9,039 |
| Netherlands | 40,344 | 7,275 | 47,619 |
| Sweden | — | 3,527 | 3,527 |
| Switzerland | 7,937 | 5,953 | 13,890 |
| Turkey | 220 | — | 220 |
| Benelux | 5,511 | — | 5,511 |
| <i>Deutsche Demokratische Republik</i> | 146,606 | 154,984 | 301,590 |
| Argentina | 220 | — | 220 |
| Brazil | 254,852 | 276,898 | 531,750 |
| USA. | 22,046 | — | 22,046 |
| French East Africa | 9,039 | 220 | 9,259 |
| French West Africa | 9,480 | 54,895 | 64,375 |
| Algiers | 30,203 | 4,189 | 34,392 |
| New-Caledonia | 1,543 | — | 1,543 |
| French Indochina | 228,397 | 441 | 228,838 |
| Madagascar | 882 | 6,834 | 7,716 |
| French Morocco | 20,723 | — | 20,723 |
| Martinique | 4,630 | 1,543 | 6,173 |
| Spanish Africa | 6,614 | — | 6,614 |
| Total | <u>1,048,949</u> | <u>636,468</u> | <u>1,685,417</u> |

The following quantities have been imported during the calendar year 1953.

| Countries | Jan.—June 1953 lbs. | July—Dec. 1953 lbs. | 1953 Total lbs. |
|---------------------------|------------------------|------------------------|--------------------|
| Western Germany | 973,331 | 108,467 | 1,081,798 |
| Great Britain | 6,393 | — | 6,393 |
| Czechoslovakia | 2,646 | 13,448 | 16,094 |
| Jugoslavia | 92,152 | 19,400 | 111,552 |
| USA. | 625,445 | 122,135 | 747,580 |
| Total | <u>1,699,967</u> | <u>263,450</u> | <u>1,963,417</u> |

It has to be reported that, as a protection of the home production in France, the import of hops from Germany was limited to origins Spalt, Tettnang and Hallertau. Customs authorities verified this by examination of seal and certificates of hop shipments.

Hop gardens in the **Muehlviertel** area have now reached the acreage of 12 acres (of which 7 acres new gardens). Some damage was caused by intense Frost in May. Downy Mildew appeared extensively under the sultry weather during the summer of 1953 and was not sufficiently controlled by reason of lack of experience. On the average only 8 sprayings were applied. The hops reached the height of the trellises by the end of May and showed a good overhang. The Set of Cones, however, sometimes appeared only on the top third of the vines.

Austria

Picking began on August 19th and was finished on September 8th under good weather conditions. The total harvest amounted to 12,125 lbs. (1010 lbs. per acre). Both the colour and the quality of the hops had been impaired by Downy Mildew. About one third of the hops was estimated as medium quality, the rest as off-grade.

The Austrian brewing industry has agreed to accept home grown hops during the next 15 years, up to a quantity of 50 tons = 110,000 lbs.

Hops are delivered to breweries through a co-operative. Payment is effected on the basis of a calculated quotation based on prices for foreign hops on October 15th of each year. German and Czechoslovakian quotations account for 30% of the price. The remaining 40% are being calculated according to prices for Yugoslavian, Belgian, French, English and eventually American hops. Prices are somewhat graduated for variations in quality.

Styria. About 10 acres are planted to hops in this district.

In this country, too, the record growth of hops all over Europe has been experienced. A crop of 29,211 lbs. was harvested on the somewhat increased area of 17 acres (1.80 acres new gardens). Rainfalls were distributed as follows:

Switzerland

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|-----|------|------|------|-------|------|------|-------|
| 15 | 30 | 4 | 64 | 88 | 180 | 140 | 46 | 56 | 31 | 13 | 26 mm |

The plants reached the height of the trellises on June 30th and developed a luxuriant overhang. There were, however, practically no cones on the lower third of the vines. Picking went on from August 24th until September 15th. The hops were good in colour and the quality was estimated as good-medium. The coarse conformation of the cones of crop 1953 was notable in Switzerland as well. All hops were taken over by sponsoring breweries at prices from sfrs. 350.—/405.— according to quality.

Growth of the hops suffered under cold weather and Frost during the first half of May followed by hot and dry weather until harvest. Precipitations 1953 were rather scarce:

Sweden

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|-----|------|------|------|-------|------|------|-------|
| 28 | 26 | 18 | 28 | 33 | 16 | 47 | 50 | 48 | 14 | 24 | 33 mm |

Preventive sprayings against Downy Mildew were effected 5 times. Red Spider had to be controlled and shortly before harvest there occurred a strong attack by Aphids and Red Spider. The plants reached the height of the trellises by the end of June and showed only little overhang. Bloom was plentiful but yield was smaller than expected in consequence of the dryness. Hops type "Svalöf" were harvested from August 20th/26th and brought well sized cones of fine colour and good quality. Hops type Saaz were gathered in from September 7th/22nd and were better than the year before, although cones were not uniform.

The acreage stands unchanged at 22 acres. All hops are taken over by sponsoring breweries and prices are the same as for Hallertau hops.

Hop cultivation in Spain has been increased by abt. 20% in 1953 against the year before. The expansion of acreage was effected mostly in the district of León with some increases in the district of Asturias-Santander. There has been no expansion of acreage in Galicia as the acreage in this district already corresponds to present possibilities. The cultivation of hops has not yet brought the expected commercial results in the district of Vasco-Navarra, so that no increases are contemplated there. General extension of the hops acreage in Spain is set at abt. 15% for 1954.

Spain

Crop 1953 did not bring the expected yield by reason of unfavourable weather. Aphids as well as Downy Mildew were successfully controlled. The total crop was 366,515 lbs. of which 88.5% were estimated as prime, 8.5% as medium and only 3.0% as off-grade. Sales to breweries are effected at Pesetas 100.— per kilo.

Existing warehouses were enlarged and new presses have been erected, so that the capacity of the plants now corresponds to prospective yields.

England

Sufficient rainfall especially in April and July brought good possibilities for the growth of the hops, after March had been too dry. It was necessary to spray conscientiously against Aphids whereas Downy Mildew became notable sporadically only at the close of the growing season: The crop was so rich that most farmers left some hops unpicked after their quota had been reached.

Rainfalls were distributed as follows:

| District | Jan. | Febr. | March | April | May | June | July | Aug. | Sept. |
|-----------|------|-------|-------|-------|------|------|------|------|-------------|
| Kent | 1.09 | 1.22 | 0.21 | 2.44 | 1.90 | 1.50 | 2.83 | 1.82 | 3.10 inches |
| Worcester | 0.46 | 1.36 | 1.12 | 2.53 | 2.79 | 1.97 | 3.31 | 4.20 | 2.49 inches |

Picking went on from August 25th until October 4th under generally good weather conditions. The harvested crop was of better quality, on the average, than during the preceding years because of selective picking. The hops were well ripened and of greenish-yellow colour with higher bitter values than in former years. The preserving value of the hops was higher than in 1952.

About three quarters of the English crop consists of Fuggles hops of which 50% were estimated as prime quality, 40% as medium and 10% as off-grade. The last quarter of the crop is made up mostly of Goldings and Goldings varieties as well as a number of new types, some of which are in good demand.

Lack of pickers results in always more widespread use of picking machines. Experiences gathered during the preceding years will make for continually improved results.

The average price for producers was established at £ 27.10.— per cwt. (DM 318.50 per 50 kilos). All picked hops were sold under the existing marketing agreement.

| Exports of English Hops Crop 1953 | | | |
|-----------------------------------|--------------|---------------------------------|--------------|
| September 1953 — April 1954 | | | |
| Australia | 8,363 cwts. | b. f. | 50,855 cwts. |
| Belgium | 711 " | Mauritius | 1 " |
| Brit. Honduras | 2 " | Netherlands | 164 " |
| Canada | 2,087 " | Nyassaland | 5 " |
| Ceylon | 83 " | Northern Rhodesia | 220 " |
| Denmark | 49 " | Austria | 92 " |
| Germany (East and West) | 3,965 " | Pakistan | 49 " |
| Fiji-Islands | 17 " | Pacific Islands | 5 " |
| Finland | 678 " | Sierra Leone | 1 " |
| Gold Coast | 98 " | Singapore | 13 " |
| Hong Kong | 1 " | Sudan | 13 " |
| India | 157 " | Union of South Africa | 402 " |
| Iraq | 89 " | Southern Rhodesia | 447 " |
| Eire | 33,653 " | Sweden | 71 " |
| Jamaica | 13 " | Switzerland | 11 " |
| Channel Islands | 327 " | Tanganyika | 19 " |
| Kenya | 215 " | Trinidad | 6 " |
| Federation of Malaya | 15 " | USA. | 5 " |
| Malta and Gozo | 332 " | | |
| c. f. | 50,855 cwts. | Total | 52,379 cwts. |
| 1 cwt. = 50,8 kilos | | | |

The following demands have been registered for crop 1954:

Home consumption: 215,000 cwts. = 218,440 Ztr. (1953: 222,109.5 cwts. = 225,663 Ztr.)
 Export: 10,943 cwts. = 11,118 Ztr. (1953: 15,366.5 cwts. = 15,613 Ztr.)

USA.

California. After warm weather with light rainfall had stimulated growth in February 1953, the hop gardens in Sonoma and Mendocino suffered under cold and wet weather during March and April. There were interruptions in growth noticeable in many gardens which weakened and in part destroyed the plants. Growth was hampered furthermore by Downy Mildew which appeared in April. About two thirds of the crop in this district were lost. Some gardens were somewhat better, especially where picking was late the year before. All gardens which were picked by hand in 1952 brought good crops. This seems to indicate that the hops were weakened by machine picking to such an extent that the plants could not resist the adverse weather during the spring of 1953. Rains were distributed as follows:

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|------|------|------|------|-------|------|------|-------------|
| 6.74 | 0.08 | 3.17 | 3.91 | 0.57 | 0.97 | — | 0.17 | — | 1.31 | 4.64 | 0.96 inches |

Spraying against **Downy Mildew** were only effected 2 or 3 times on the average. The hops in normally developed gardens reached the height of the trellises abt. 10 days later than usual. Weaker vines developed considerably later and generally did only reach the blooming stage with no cones resulting.

Picking began on September 1st, about 8 days later than usual. Weather during the harvest was good and warm and there were only occasional rains.

About two thirds of the crop were estimated as medium quality with few prime lots while the rest was off-grade. On the average cones were smaller than normal.

Sacramento hops developed normally under generally good weather conditions. **Downy Mildew** was limited to some especially susceptible locations. Preventive control measures were applied against **Red Spider**. Rainfalls were distributed as follows:

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|------|------|------|------|-------|------|------|-------------|
| 3.51 | 0.21 | 1.42 | 2.69 | 0.52 | 0.61 | — | 0.67 | — | 0.18 | 1.79 | 0.56 inches |

It is to be noted that the exceptional precipitations in August 1953 were caused only by a sudden storm. All rainfalls in August during more than 20 years together did not bring so much rain as noted in August 1953 alone.

The hops reached the height of the trellises between the 5th and 10th of June and showed good overhang. **Picking** was in full swing on August 10th, and finished during the first days of September. The whole harvest is mechanized. Weather during picking was good. The quality of the crop was judged to be medium to prime with only a small proportion off-grade.

Western Oregon. Growth of the hops was especially slow in 1953 as the nights were cooler than normal. Considerable rainfalls in May caused a strong attack of **Downy Mildew**. As far as this disease was not controlled there was practically no crop especially on late varieties whereas well tended gardens brought average yields. Precipitations were as follows:

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|-------|-------|-------|-------|------|------|------|------|-------|------|------|-------------|
| 15.40 | 4.87 | 4.95 | 1.58 | 3.76 | 1.34 | — | 1.65 | 1.59 | 3.06 | 6.99 | 7.80 inches |

Spraying against **Downy Mildew** were effected about 10 times on the average, whereas many farmers sprayed up to 25 times. Both sprayings and dustings are applied.

Hops reached the height of the trellises generally during the second week of June and showed good overhang. A considerable part of the hops on the lower part of the vines did not ripen.

Picking began generally on August 18th and was finished on September 10th. The harvest is almost completely mechanized. Weather during picking time was sometimes rainy. The formation of the cones showed insufficient ripeness. The major part of the crop was of medium quality in consequence of the unfavourable weather conditions during the spring which hampered growth and sometimes resulted in secondary growth which brought only half-developed cones until harvest time.

Eastern Oregon and Idaho. The weather was cooler than usual during April and May so that the vegetative development was retarded. A better growth started only by the beginning of June. There was no damage by **Downy Mildew**. A rather heavy infestation of **Aphids** and **Red Spider** at the beginning of vegetation was controlled by sprayings and dustings. Precipitations in 1953 are indicated as follows:

| Jan. | Febr. | March | April | May | June | July | Aug. | Sept. | Oct. | Nov. | Dec. |
|------|-------|-------|-------|------|------|------|------|-------|------|------|-------------|
| 3.35 | 1.49 | 0.92 | 1.52 | 2.59 | 1.22 | — | 0.12 | 0.02 | 0.11 | 1.31 | 1.15 inches |

Spraying against **Downy Mildew** are not in practice. The hops reached the height of the trellises by mid-June and showed a good overhang. Cones ripened throughout the length of the vine. **Picking** began on August 25th and was finished by September 22nd. The harvest is fully mechanized. The weather during picking time was favourable. The colour and quality of the hops was about equal to that of crop 1952. About 80 % of the hops were of prime quality, 15 % medium and 5 % off-grade.

Washington. The weather was generally favourable in the district of **Yakima**. Warm days and cold nights in early summer resulted in considerable dew on the hops. Precipitations during 1953 totalled 8.39 inches. There is no **Downy Mildew** in this district under these dry weather conditions.

The height of the trellises was reached by mid-June and the hops were overhanging the trellises. **Picking** began on August 23rd and was finished on September 25th. There was no handpicking anymore in **Yakima** in 1953.

The weather during the harvest was good. The quality of crop 1953 was only a little lower than the year before. The crop was estimated as 30% prime quality, 50% medium and 20% off-grade.

Acreage USA.

Farmers reduced acreage more than 25% as against 1952, after the marketing agreement in the USA. was discontinued on June 30th, 1953. The bulk of the crop was reduced more than 30%, as compared to 1952, and brought about the same quantity as had been "salable" in 1952.

Seedless qualities were sold out until the spring of 1954 with the exception of small remaining lots, whereas there was less demand for seeded hops.

Hop Imports USA.

| Hop Imports USA. Crop 1953 | |
|-------------------------------|------------------|
| September 1953— February 1954 | |
| Country | lbs. |
| Belgium/Luxembourg | 6,358 |
| Canada | 2,975 |
| Germany | 3,231,248 |
| Great Britain | 527 |
| Jugoslavia | 1,443,953 |
| Netherlands | 38,581 |
| Total | 4,723,642 |

Hop Exports USA.

| Exports of US-Hops Crop 1953 | | | |
|----------------------------------|-----------|---------------------------------|------------------|
| October 1953 — February 1954 | | | |
| Country | lbs. | Country | lbs. |
| Angola | 22,050 | b. f. | 4,704,676 |
| Belgium/Luxembourg | 155,982 | Honduras | 45,760 |
| Congo | 33,184 | Indonesia | 5,796 |
| Bolivia | 55,083 | Jamaica | 10,000 |
| Brazil | 593,396 | Mexico | 2,125,483 |
| Canada | 1,534,691 | Mozambique | 2,250 |
| Canal Zone | 15,164 | Nicaragua | 6,767 |
| Ceylon | 48,000 | Netherlands | 18,189 |
| Chile | 383,648 | Norway | 5,622 |
| Columbia | 1,367,586 | Panama | 45,167 |
| Costa Rica | 6,614 | Peru | 161,347 |
| Cuba | 127,915 | Philippine Islands | 90,359 |
| Denmark | 171,332 | Portugal | 11,038 |
| Dominican Republic | 15,904 | Salvador | 88,842 |
| Ecuador | 112,712 | Union of South Africa | 118,050 |
| Formosa | 22,046 | Switzerland | 71,436 |
| French Morocco | 6,614 | Uruguay | 80,212 |
| French Pacific Islands | 2,030 | Venezuela | 180,974 |
| Guatemala | 29,725 | Other Countries | 10,000 |
| Haiti | 1,000 | Total | 7,781,968 |
| c. f. | 4,704,676 | | |

Argentine

During the Harvest in March 1954 it resulted that yields per acre in all three districts of production were higher than the year before.

Mar del Plata. Hop yards developed normally under favourable weather conditions until about one month before picking. From this time on, strong and hot winds hampered the normal development of the cones. There were no diseases or pests.

Sierra de la Ventana. The hops suffered under dryness during the last two months before harvest. There were neither insects nor diseases.

Rio Negro. Hop yards in this district showed the usual very good development. Diseases continued to be absent but there was a light attack of Red Spider in a few gardens.

The total crop of the Argentine amounts to 167,550 lbs. on an area of 319 acres (of which 72 acres new gardens).

Hallertau. Inclement weather continued until the middle of April. Spring work was begun during the first days of April and finished by the second half of that month. Some **Root Rot** was noticeable when the hops were uncovered and cut. This disease was rather widespread in some areas. The weather was generally cool during April but there were ample precipitations which somewhat offset the insufficient winter moisture. Growth was healthy on the average, although the weather during May was irregular. Preventive sprayings were applied against **Downy Mildew** as well as pests. The weather became warmer during the first half of June and benefitted the good and healthy development of the plants after welcome rainfalls. The appearance of **Grubworms** required attention.

Spalt. Spring work set in by the beginning of April and was interrupted by rain and snowfall during the middle of that month. Warmer weather in May improved the development and in June the plants had already offset part of their retarded growth. Generally hop yards showed a healthy aspect. Preventive sprayings against pests and diseases have been applied.

Tettang. There were only insignificant precipitations during March and temperatures were low. The uncovering and cutting of the hops began normally and was not hampered by weather conditions.

More rain than normal during April increased soil moisture. Weather in May was cool and disagreeable with ample precipitations and occasional **Hails**. The unstable weather continued until June. The vegetative development of the hops was retarded as compared with former years and warmer weather was very necessary for the development of the plants.

Hersbrucker Gebirge. Soil moisture decreased as a consequence of insufficient precipitations during the winter months. Spring work started at the beginning of April and was hampered by precipitations. **Root Rot** was noticeable in some gardens. The weather in May continued cool to cold, after a passing warmer spell in the beginning of this month, and the plants showed retarded growth. There were insufficient precipitations in May but welcome rains fell by the beginning of June.

Wuerttemberg. Spring work was finished by the middle of April in spite of interruptions by unfavourable weather. The weather continued from cool to cold with occasional **Nightfrosts** until May. A warm spell in mid-May was very welcome for the development of the hops but the weather soon became changeable again and was irregular until June so that growth was slower than normal.

The general development of the hops in Germany is about ten days to a fortnight later than normal, by reason of the cool and adverse weather during the spring and early summer of 1954. The general aspect of the plants, however, is healthy and retarded growth may be quickly recuperated as soon as warmer weather begins to prevail.

JOH. BARTH & SOHN

The compilation of this report has been made possible in many instances by data supplied from observers in many countries, which is hereby gratefully acknowledged.

Hop farm "BARTHOF"



The hop farm "BARTHOF" is situated on the heaviest soils within the center of the HALLERTAU and is one of the biggest producers of hops in Germany. A yield of 2,450 lbs. per acre in 1953, well above average, was achieved by the application of modern farming methods. These hops receive the seal of WOLNZACH or AU.

Friends are cordially invited and always welcome to inspect the farm and its installations.