DISEASES OF ORNAMENTALS.

BEGONIA

LEAF SPOT - Cercospora sp.

Leaf spot was very severe at Experimental Station,
Fredericton, N. B.

BARBERRY

RUST - Puccinia graminis Pers.
See under Stem Rust of Wheat.

BUCKTHORN

RUST - Puccinia coronata Corda. See under Leaf Rust of Oats.

CARAGANA

LEAF SPOT - Septoria Caraganae (Jacz.) P. Henn.

A rather heavy infection of leaf spot occurred on the University campus, Saskatoon, Sask. Some bushes appeared to be more susceptible than others.

CARNATION (Dianthus Caryophyllus L.)

RUST - <u>Uromyces Dianthi</u> (Pers.) Niessl.

A small amount of rust was present in a greenhouse in New Brunswick in November. It was found in abundance in greenhouses at Charlottetown, P. E. I. in January.

LEAF SPOT - Alternaria Dianthi Stev. & Hall.
Reported from Iberville, Que.

CHINA ASTER

YELLOWS - Virus disease.

B. C. -

Yellows was present to a very slight extent in the Okanagan Valley.

Alta. -

Plants submitted for examination from Calgary were found to be affected with yellows. All the plants in a block of two thousand were reported to be infected with the disease.

Sask. -

Yellows affected most of the plants in the beds examined at the Experimental Station, Rosthern. The disease was also present at Saskatoon, where in several beds of asters 10 to 15 per cent of the plants were affected.

China asters.

N. B. -

Yellows was extremely severe on all varieties planted at the Experimental Station, Fredericton.

WILT - Fusarium conglutinans Woll. var. Callistephi Beach.

Sask. -

A small percentage of the plants in certain beds at Experimental Station, Rosthern, wes affected with disease. It also destroyed several small beds of asters on the University campus, Saskatoon.

Ont. -

Diseased plants were sent for examination from Brockville and East Windsor.

Que. -

Wilt was very common in the Montreal district. It was also serious in other parts of the Province. Fifty per cent of the plants were killed by the disease in a small garden at Port Viau.

N. B. -

Wilt occurred only slightly this year. It was less severe than in previous seasons.

RUST - Coleosporium Solidaginis (Schw.) Thum.

A slight but general infection developed late in the season at the Experimental Station, Fredericton, N. B.

CHRYSANTHEMUM

YELLOWS - Virus.

A slight amount of yellows occurred in the Experimental Station greenhouse, Fredericton, N. B.

DAHLIA

The disease caused some loss at Summerland, B. C. It was also reported from Toronto, Ont.

MOSAIC - Virus disease.

Mosaic was a very common disease on the most valuable dahlias at Charlottetown, P.E.I. Several varieties have been discarded on account of mosaic. It is also reported from the Experimental Station, Fredericton, N. B.

DUTCHMAN'S PIPE (Aristolochia Sipho L'Her).

STEM ROT - Sclerotinia Sclerotiorum (Lib.) de Bary.

Specimens from Lennoxville, Que. were found affected with stem rot.

GERANIUM (Pelargonium)

LEAF SPOT - Cercospora ?Brunkii Ell. & Gall.

A slight infection occurred in the Experimental Station greenhouse, Fredericton, N. B.

GLADIOLUS

BULB ROT - Fusarium sp.

A slight amount of rot occurred at Fredericton, N. B.

The following diseases were found in specimens submitted by correspondents.

Dry Rot-Sclerotium Gladioli Massey from London, Todmorden and Toronto.

Storage Decay - Penicillium Gladioli McCulloch & Thom. from Salmon Arm, B. C.

Scab - Bacterium marginatum McCulloch from Welland, Ont. and Salmon Arm, B. C.

GOLDEN GLOW (Rubeckia)

POWDERY MILDEW - Erysiphe Cichoracearum DC. Several in gardens at Edmonton, Alta.

HOLLYHOCK

RUST - Puccinia Malvacearum Bert.

Ont. -

Diseased specimens were submitted from Douglas, Hampton and Picton.

Que. -

Rust was general in the Montreal district. It caused serious damage at Chateauguay Basin and on the Island of Montreal.

N. B. _

Rust was widely distributed and infection was severe.

N. S. The disease was reported from Kentville.

Rust has been responsible for the destruction of many of our best hollyhocks (R. R. Hurst),

LEAF SPOT - Ascochyta althaeina Sacc. & Bizz.

P. E. I. This leaf spot was reported as very common on many varieties.

RIS CARRIED BUILDING CONTROL

LEAF SPOT - <u>Didymellina macrospora</u> Kleb. (<u>Heterisporium gracile</u> Sacc.)

- Ont. Diseased specimens were received from Newcastle.
- N. B. Leaves were moderately infected late in the season,
 but it is of little economic importance.
- P. E. I. Leaf spot was very common.

7

RHIZOME ROT - Bacillus carotovorus L. R. Jones.

- Ont. Diseased specimens were submitted from Toronto.
- N. B. One severe case of rhizome rot was observed in Fredericton.

BLIGHT - Botrytis sp.

A blight of Iris caused by a Botrytis was very common after rainy weather in Queens county, P. E. I.

LARKSPUR (Delphinium)

POWDERY MILDEW - Erysiphe Polygoni DC.

Infection was general, but no severe damage was done in New Brunswick. Diseased specimens were also submitted from Sharbot Lake, Ont.

Larkspur.

BACTERIAL BLIGHT - Bacterium Delphinii (E.F.Sm.) Bryan.

The disease was general but slight in York county, N. B.
The organism should be referred to the genus Pseudomonas to be in accord with nomenclature here adopted.

LILAC

LEAF BLIGHT - Pseudomonas Syringae van Hall.

Diseased specimens were submitted from Vernon, Ont.

POWDERY MILDEW - Microsphaera Alni (Wallr.) Salm.

Powdery mildew was general but not serious in N. B.

Young shoots and leaves of lilacs were found attacked with <u>Sclerotinia</u> sp. at Ste. Anne de la Pocatière, Que. The shrubs were growing in a low, not unusually damp place. Sclerotia were present on the affected parts.

NARCISSUS

SMOULDER - Botrytis narcissicola Kleb.

Diseased specimens were submitted from New Westminster, B.C.

EEL WORM - Tylenchus dipsaci (Kühn) Bast.
Infected bulbs were sent from Burlington, Ont.

PEONY

BLIGHT - Botrytis Paeoniae Oud.

Diseased specimens were submitted from Meaford and

Chesterville, Ont. and Acton Vale, Que.

Blight was present, but it was of no economic importance in N. B. $\,$

It was very severe on several varieties causing a wilting of the plants at Kentville, N. S.

Blight was common and destructive about Charlottetown, P.E.I.

LE.F SPOT - Septoria Paconiae West. var. berolinensis Allesch.
Plants affected with the disease were received from Galt, Ont.

PHLOX

POWDERY MILDEW - Erysiphe Cichoracearum DC,
Diseased specimens were received from Newcastle, Ont.

LEAF SPOT - Septoria divaricata Ell. & Ev.

The disease occurred locally about Fredericton, N. B.

ROSE

BLACK SPOT - Diplocarpon Rosae Wolf. (Actinonema Rosae (Lib.) Fr.)

2

Black Spot was found in abundance in connercial greenhouses, Niagara-on-the-Lake and East Windsor. The disease was reported on Frau Karl Druschki and Claudius Pernet at Ottawa, Ont.

Black spot was moderately severe at Experimental Station, Fredericton, N. B. It was reported as common on Frau Karl Druschki and Her Majesty at Charlottetown, P.E.I.

POWDERY MILDEW - Sphaerotheca pannosa (Wallr.) Lev.

Powdery mildew was more prevalent than in previous years in the Okanagan Valley, B. C.

Diseased specimens were received from Brockville, Whitby and Ottawa, Ont. It was fairly severe on rambler roses.

Rambler roses were the most seriously attacked in Nova Scotia. Mildew was seen or reported from many parts of the province.

RUST - Phragmidium spp. Rust was observed on cultivated roses in Alberta. Ιt was common on wild roses.

Rust occurred only slightly in New Brunswick. Baron de Rothschild was heavily infected with rust causing some defoliation at Charlottetown, P.E.I. It was also common on many other varieties.

INFECTIOUS CHLOROSIS - Cause unknown.

Fifty per cent of the roses in one greenhouse in Ontario were affected with the disease. It was observed in stock from British Columbia only; the disease, however, was general in plants from that source.

A species of Sclerotinia was found attacking a few young rose plants at Neuville, Que.

SNAPDRAGON (Antirrhinum)

RUST - Puccinia Antirrhini Diet. & Holw. Rusted specimens were received from Hopewell Cape and West St. John, N. B.

SWEET PEA

WILT - Fusarium Lathyri Taub. Specimens affected with wilt were received from Huntington, Que, and Amherst, N. S. It was reported as destructive in a garden at Charlottetown, P.E.I.

Sweet Pea.

ROOT ROT - Thielavia basicola Zopf.

This fungus caused a severe root rot at Kentville, N. S. Specimens were also received from Weymouth, Wolfville and Amherst.

POWDERY MILDEW - Microsphaera diffusa Cke. & Peck.
It occurred only slightly in York county, N. B.

MOSAIC - Virus
Isolated cases of mosaic were observed in York county, N.B.

BUD ROOT - Non-parasitic.

Bud rot was quite prevalent in York county, N. B.

TULIP

BLIGHT - Botrytis Tulipae (Lib.) Lind.
One thousand bulbs each of Princess Elizabeth and Bartigon, which had been obtained from Holland, were all affected with blight when they were grown at Weston, Ont. Diseased specimens were also received from New Westminster, B. C.

ZINNIA

ROOT ROT - Fusarium sp.

Twenty-five per cent of the plants in a bed at

Experimental Station, Summerland, B. C. were affected with
a root rot caused by a species of Fusarium.