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Appendix 1. The disaggregated tariff data.

General:

We estimated average tariffs by dividing customs revenues by imports. Goods are categorized into three groups: agricultural, manufactured and 'exotic' goods.

We used the Standard International Trade Classification (SITC) to assign the goods to different groups. We used the following specifications to calculate the three categories of tariffs, with the differences depending on how wine, raw cotton and raw silk are categorized:

Baseline 1: Agriculture, including raw silk, raw cotton, plus wine in Germany,

France, Italy, Australia and USA, because they are wine producers.

Exotics, including wine in the non-wine-producers (Canada,

Denmark, Norway, Sweden, and United Kingdom)

Manufactures, including beer and spirits

Baseline 2: Agriculture, including raw silk, raw cotton, plus wine in Germany,

France, Italy, Australia and USA, because they are wine producers.

Exotics

Manufactures, including beer and spirits, and wine in the non-

wine-producers (Canada, Denmark, Norway, Sweden, United

Kingdom)

In the few cases where the overall figures for imports or customs revenues exceed the sum of the individual goods reported, we increased the totals for our three categories proportionally so that they summed to the correct total. Imports or customs revenues classified as "others" or "other goods" were proportionally divided between our three categories.

Below we give country-specific details of how we classified particular commodities, other than beer, spirits and wine.

United Kingdom: Data were taken from the *Statistical Abstract for the United Kingdom*, HMSO, London. Values for spirits and wine are given for imports and customs revenues for all years.

Imported goods classified as agriculture:

Animals not for food; currants; feeding stuffs for animals; fruits preserved in sugar; glucose; grain and flour; hides and skins undressed; horses; live animals for food; meat; molasses; other animals; other dried or preserved fruit; other food and drink (non-dutiable); other sorts of refined sugar; raisins; raw cotton and cotton waste; seeds and nuts for oil, fats resins and gums; sugar refined; sugar unrefined, beetroot; sugar unrefined, cane and other sorts; wood and timber; wool, raw and waste and rags; raw silk (NB: in this data appendix raw silk and raw cotton are classified with agriculture, but as already mentioned in the 3rd sensitivity specification they are shifted to the 'exotics' category) Imported goods classified as manufactures:

Apparels; chemicals; cocoa preparations; drugs, dyes and colours; coal; coke and manufactures fuel; cotton yarns and manufactures; cutlery, hardware implements and instruments; earthenware, glass abrasives etc.; electrical goods and apparatus; iron and steel and their manufactures; iron ore and scrap; leather and leather manufactures; machinery; manufactures of other textiles; milk, condensed sweetened; manufactures of wood and timber; miscellaneous raw materials; non-ferrous metal and their manufactures; non-ferrous metalliferous ores and scrap; non-metalliferous mining and quarry products; oils, fats, resins, manufactured; other manufactures; other textile materials; paper and cardboard; paper making materials; rubber manufactures; other articles; ships; silk and

silk manufactures (raw silk is listed separately); vehicles including locomotives ships and aircraft; woollen and worsted yarns and manufactures

Imported goods classified as exotics:

Cocoa, raw; rubber; coffee; tea; tobacco

Customs revenues classified as agriculture:

Sugar and molasses; corn, meal and flour; currents, raisons and dried fruits

Customs revenues classified as exotics:

Tea; coffee/cocoa/chicory; tobacco and snuff;

Customs revenues classified as manufactures:

Other manufactured articles; miscellaneous receipts; motor spirit

France: The data were taken from *Tableau General du Commerce de la France avec ses*Colonies et les Puissances Etrangeres, Direction Generale des Douanes, Paris. Values for spirits, beer and wine are given for imports and customs revenues for all years.

Imported goods classified as agriculture:

Bones, hoofs, horns of livestock/cattle; cattle; cereals; cheese and butter; common wood; flax; fruit; game and poultry; eggs; hemp; hops; horses; jute; meat, fresh and salted or otherwise preserved; oil producing fruits and seed; oilcake of oil seeds; olive oil; plaits or braids of straw; rice; scrap wool; sea fish; seed oil and oil from fruit and peanuts; seeds to sow; skins and furs; sugar from others; sugar from French colonies; vegetables and their flour; silk and floss of silk; cotton wool; volatile oil and essence of vegetables; wool in bulk

Imported goods classified as manufactures:

Arms; carriages; cast iron of all sorts; coal - raw and charred; collector's items out of business; copper; cotton thread not including scrap thread; fabric of linen or hemp; fancy goods, brushes, fans and buttons; fat of all sorts; feather trimmings; furs, manufactured; gold or silver plate and jewellery; hats; indigo; iron, cast iron and steel; lead; leather or skin goods; machinery and apparatus; manufactured leather; medicinal goods; mother of pearl; oil and paraffin etc.; ore of all sorts; other merchandise, paper; paper, cardboard, books and prints; plates of raw whale bone; postal parcels; pottery, glasses and crystal; raw platinum in bulk; raw tin; rubber goods; sodium nitrate and potassium nitrate; stone and clay for arts and crafts; woven silk; sulphur; thread of linen or hemp; tools and metalwork; watches; wool thread, woven cotton; woven wool; zinc

Imported goods classified as exotic:

Coffee; cocoa; tobacco leaves; rubber and gutta-percha raw; exotic wood; guano and other manure; saffron; tobacco manufactures or only prepared /made up

Customs revenues classified as agriculture:

Cattle; cereals; cheese; common wood; fish, fresh, salted, dried and preserved; fruit; game and poultry, eggs; horses; meat, fresh and salted or otherwise preserved; noodles; rice; seed oil and oil from fruit and peanuts; sugar from others; sugar from French colonies; vegetables and their flour; wool in bulk

<u>Customs revenues classified as manufactures:</u>

Chemical products; coach/car body; coal - raw and charred; cotton thread not including scrap thread; fabric of linen or hemp; fancy goods, brushes, fans and buttons; iron, cast iron and steel; lead; leather or skin goods (with manufactured fur); machinery and mechanisms; manufactured leather; oil and paraffin etc.; other merchandise; paper and its

products; petroleum; pottery, glasses and crystal; rubber goods; thread of linen or hemp; tools and metalwork; woven cotton; woven silk; woven wool

Customs revenues classified as exotics:

Coffee; tobacco leaves; cocoa; pepper and spice; tea; tobacco manufactures or cigarettes

Norway: Data were taken from *Statistisk Aarbok for Kongeriket Norge*, Det Statistisk Centralbyraa, Kristiania. Wine and spirits are separately listed for custom revenues, but aggregated as 'drinks' in imports. We assume equal tariff rates and use the share of custom revenues for wine, beer and spirits to estimate the import shares.

<u>Imports classified as agriculture:</u>

Cereals; edible animal products; fruit, vegetables; hair feathers, skin and other animal products; live animals; timber

Imports classified as manufactured:

Dyestuff and prepared paints; manufactures of fats and oils etc.; manufactures of hair and skin; manufactures of metal; metal, crude and semi manufactured; mineral products; minerals, crude materials; other manufactures; other vegetable materials and manufactures thereof; other articles; paper and manufactures thereof; ships, vehicles, machinery; spinning materials; textile manufactures; woods products; yarns, thread etc; fats, oils, rubber and similar materials (divided by two, the other half is in exotics)

Imports classified as exotic

Groceries from colonies; fats, oils, rubber and similar materials (divided by two, the other half is in manufactures)

Customs revenues classified as agriculture:

Cereals; fruits; rice; sugar; syrup

Customs revenues classified as manufactures:

Fur, manufactured; metal works; other goods; petroleum and paraffin; salt; varnish;

woven goods; yarn

Customs revenues classified as exotics:

Other goods from colonies; coffee; tea; tobacco; tropical spices

Italy: Data were taken from *Movimento Commerciale*, Ministero delle Finanze,

Direzione Generale delle Gabelle, Rome. The reported good categories for imports and

customs are identical.

Imports and customs classified as agriculture:

Animals, products and skins of animals not included in other categories; cereals, flours,

pastes and vegetable products not included in other categories; silk; linen, jute; cotton;

wood and straw; wool, horse hair and fur

<u>Imports and customs classified as manufactures:</u>

Chemical products, medical items, resins and perfumes; colours and products for

colouring and tanning hemp, linen, jute, and other filamentous plants, excluding cotton;

leather; minerals, metals and their products; paper and books; precious metals; stones,

terracotta, crockery, glasses and crystals; various items; vehicles

Imports and customs classified as exotics:

Elastic rubber, and gutta-percha and their products, colonial products, drugs and tobaccos

Denmark: For 1875, 1876 the data were taken from Henrik Folde (1989), *Liberalisme*

og Frihandel 1814-1914, Toldhistorisk Selskab and Niel Thomsen, Industri Stat og

Samfund 1870-1939, Dansk industri efter 1870, Bind 2, Odense Universitetsforlag. From

1892 we used Statistisk Årbog Danmark. Tariff rates between 1876 and 1892 were

interpolated. For 1876 and 1877, imports of wine, beer and spirits are aggregated in

'other food and beverages'. Customs revenues are covered in 'beverages'. Folde (1989)

also provides tariff rates for beer and spirits for 1872. Under the assumption that tariff

rates did not change and that the import shares of wine, beer and spirits as well as the

total share of beverages in total imports were equal to the ones in 1890 it is possible to

approximate the shares of customs revenues and imports for wine, beer and spirits.

<u>Imports classified as agriculture:</u>

For 1875, 1876:

Agricultural products; timber; butter; oil seeds; meat, cheese, eggs

From 1892:

Animal foodstuffs; cereal products; fodder and grain; grain flour; hair, fur, horns, bones,

feathers and other animal materials and products of, and manure; live animals; plants of

the field or garden; wood - worked or not; products of horticulture and fruit; tallow, oils,

tar, rubber, gums, etc and their products (divided by three, with one third being allocated

to each category)

<u>Imports classified as manufactures:</u>

For 1875, 1876:

Coal; glass ware; manufactured products; metal; salt; oil

From 1892:

Chemicals, fertilizer etc.; clothing; dyes, etc.; fabric from plant matter; iron/steel and

products; linen or hair fabric; manufactures of plant matter; metals; minerals –

manufactures; minerals, worked or not; other products of plant matter; paper and

stationary; products of hair, fur, horns, bones, feathers and other animal materials; silk

fabric; string and thread; textiles; wood – worked; ships, vehicles, machinery and

instruments etc.; other products; tallow, oils, tar, rubber, gums, etc and their products

(divided by three and one third in every category)

Imports classified as exotics:

For 1875, 1876:

Coffee; tea; tobacco

From 1892:

Foodstuffs- colonial and fruit; tallow, oils, tar, rubber, gums, etc and their products

(divided by three, with one third being allocated to each category)

Customs revenues classified as agriculture:

For 1875, 1876:

Rice; lumber; sugar

From 1892:

Animals; cheese; fish; fruit; furs; hops; oils; rice; feathers and downs; starch; sugar; wood

and pulp

Customs revenues classified as manufactures:

For 1875, 1876:

Coal; glass ware; manufactured goods; metal; salt; oil

From 1892:

electrical equipment; fabric; glassware; glue; hats; instrument; jewellery and fancy goods; machines; mats (plaits) of inner bark; metals; paper and stationary; pharmaceutical

Artificial flowers; bicycles; cake; clocks, watches; clothing; coal and cokes; dyes, etc.;

shoes; soap; string and thread; tallow; toys; vehicles; other; wood and wood products

products; pottery; powder; products of metalwork; perfume; rope; salt; ships and boats;

(wood and pulp is a separate category, included above in agriculture); without class

Customs classified as exotics:

For 1875, 1876:

Coffee; tea; tobacco

From 1892:

Cocoa; coffee; spices; foodstuffs- colonial and fruit; tea; rubber; tobacco

Sweden: Data were taken from Sveriges Officiella Statistik, Statistiska Centralbyrån.

Imports and customs duties were given in 5-year averages from 1876/80 to 1906/10 and

individually from 1911-14. Wine, beer and sprits are aggregated as "alcoholic drinks".

We use the share of wine and spirits from the Danish imports to approximate imports for

all specifications, presupposing that tariffs for wine and spirits were equal.

Imports classified as agriculture:

Animal fibres; cereals; diverse animals; fruit and horticultural products; live animals;

other botanic material; other botanic products; silk; cotton; timber; other animal products

Imports classified as manufactures

Dyes; manufactures produced from animals; metal works; minerals; other articles; paper,

carton and similar products; semi finished metal works; ships; cars; machines;

instruments; talcum; tar and similar substances; textiles; textiles, raw; wood, manufactured and semi-manufactured; yarn and cables

Imports classified as exotics:

Groceries from colonies

Customs revenues classified as agriculture:

Cereals, sugar

Customs revenues classified as manufactures:

Iron and steel; machines; other merchandise; textiles

Customs revenues classified as exotics:

Imports classified as agriculture (-1895):

Green coffee, tobacco

Germany: Data were taken from *Statistik des Deutschen Reiches*.

Until 1895 tariffs were calculated using customs revenues divided by imports. After 1895 we know the tariff rates levied on different commodities. We calculate the (tradeweighted) average tariff rate for each category and multiply it by the share of dutiable imports in total imports for that category. For the years in which we calculate tariff rates using custom revenues divided by imports, imports contain values for wine, beer and spirits. In the customs revenues only wine appears. Furthermore, in the years from 1895 to 1914 there is a tariff rate for wine, but none for spirits and beer. No duties on beer and spirits appear, in either the early years or the later, although both sets of statistics are quite detailed, and there is no category such as 'drinks' which might cover beer and sprits. Thus it seems acceptable to assume zero tariff rates for spirits and beer.

Barley; bed feathers; beef skins; bone meal; bowels; bran; bristles; butter; calfskins; calves; cattle; caviar; cellulose; cheese; clover seeds; cork; cotton scrap; dried fish; dried fruits; dried nuts; eggs; feathers; firewood; fish oil; flax; floret silk; flour and other mill products; flowers; fresh fish; fruits; fruits and berries; fur; gallnut; goats and sheepskins without hair; grape; grass seeds; hair; hemp; herring; honey; hoops; horses; jute; lard; linen seed; linen oil; logs; maize; malt; meat; meat extract; oilcake (fodder); olive oil; olive oil in barrels; oats; oxen; oysters; peanuts; pigs; poppy seeds; potatoes; poultry; rapeseed; raw cotton; raw hares and rabbit skins; raw materials for baskets; raw sheep, lamb and goatskins; raw silk; resin; rice; rye; saccarose; sesame; sheep; sheep wool; silk; skin and fur for leather; straw; straw yarn; suckling pig; sugar; syrups and molasses; bulls; timber; vegetable oil; water; wheat; wood; wood different kinds; wood for baskets; young cattle

Imports classified as manufactures (-1895):

Alabaster and marble; albumin; alizarin; alkaloid; aluminium; ammoniac; aniline; aniline colour; animal carbon; anthraxes; artificial wool; artificial fertilizer; bicarbonate; black coal; books; borax; bricks; brown coal; brushes; potassium; kaolin; catechu; caustic soda; cement; chinaware; quinine; chlorinated lime; clinker; clothes and underwear; coal; coal oil; coloured glass; coloured silk; coloured wood; colours; cooker; copper; copper engraving; copper in bars; coppersmith products; cotton products; cotton textiles; cotton yarn; cotton, combed and coloured; crayons and pencils; desks; dry goods; dyewood; explosives; feathers manufactured; fat in barrels; fine leather ware; furniture; glass; gemstones; gloves; glue; goats and sheepskins, manufactured and leather; gold manufactured; gunpowder; guns; indigo; instruments; iron and copper ore; iron and steel

products; iron manufactured; iron ore; iron raw; iron semi-manufactured; iron wire; iodine; jute and linen yarn; jute and linen products; jute textiles; cobalt; coke; lead; leather of all sorts; lights of all sorts; lime; linen yarn; locomotives; marmalade; machines and parts of machines; matches; mirror glass; oil; oilcloth; other goods; other mineral oils; other ores; varnish; paintings and drawings; paper; paper hangings; paper raw; petroleum; phosphate; pianos; pitch; plum and zinc products; plumb, potash; pottery; product of mother-and-pearl; products of leather; products of linen; rags of all sorts; raw tin; rubber products; rubber varnish; salt; saltpetre; saltpetre acid; salt acid; schist; shoes; silk half manufactured; silk products; silk thread; silver and gold plates; soap; soda; stearin, palatine and paraffin; starch; steel pipe; stones; sulphur; sulphuric acid; tallow; tanning agent; tartar; telegraphy instruments; timber preservative; turpentine; timber, semi-manufactured; tin plate; toys; train tracks; trains; vehicles; vitriol; watches; whale products; white glass; white lead; windows; wood for barrels; wood manufactured; wool combed; woollen products; woollen yarn; vinegar

Imports classified as exotics (-1895):

Cigarettes; ivory, raw; tobacco, raw; camphor; cinchona; coffee; cocoa; gold raw; guano; rubber; rubber and gutta-percha; palm seeds; pepper; spices; tropical fruits; tropical fruits, dried; tobacco, manufactured; tea

Customs revenues classified as agriculture (-1895):

Beef and sheep; butter; cattle; cheese; eggs; fruit; grapes; herring; honey; hops; horses; lard; meat; mussels; pigs; rice; sugar; timber; edible oil; wheat

Customs revenues classified as manufactures (-1895):

Cocao, chocolate and sweets; cotton yarn; drugs and colours; fats and oils; leather and leather products; linen yarn; machines and vehicles; milk products and bread; petroleum; pottery; iron; silk manufactures; salt; iron raw; woollen yarn;

Customs revenues classified as exotics (-1895):

Coffee; tobacco; tropical fruits; spices; tea; cocoa; oil fruit

Tariff rates classified as agriculture:

Butter and margarine; cattle and sheep; cheese; cotton; edible oils; eggs; fruits, berries and nuts; grapes; herring; honey; hops; horses; lard; linen and other similar goods; malt; meat; oysters and other seafood; rice; seeds, cereals; silk; swine; wood; wool raw Tariff rates classified as manufactures:

Cocoa, chocolate and pastries; cotton, manufactured; drugs and colours; fuel; iron raw; leather and leather manufactured; machines and apparatus; metal manufactured; oils; pottery and class manufactures; products of mills and bakery; wood manufactured and other; wool, manufactured

Tariff rates classified as exotics:

Cocoa; coffee; oil fruits; spices; tea; tobacco manufactured; tobacco raw; tropical fruits, fresh and dried

Australia: Australia only became a united federation in 1901. The *Official Year Book of the Commonwealth of Australia* starts in 1900. Thus we use the data for Victoria, as published in the *Victorian Year-Book*, Commonwealth Bureau of Census and Statistics, Victoria Office for years prior to 1898. Missing years are interpolated.

Wine, beer and spirits are listed in imports and customs revenues for Victoria. For Australia there is neither wine nor spirits listed in either group. We therefore calculate the three categories without special regard to alcoholic drinks and extrapolate Victoria's rates.

Imports classified as agriculture:

Victoria:

Butter and cheese; fish; flour and biscuits; fruits (incl. currents and raisons.); grain – oats; grain - other (including malt and rice); grain- wheat; hides, skins and pelts; hops; live stock; meats - fresh, preserved and salted; sugar and molasses; silk; cotton; timber; wool; Australia:

Animal substances, mainly unmanufactured which are not foodstuffs; foodstuffs of animal origin excluding live animals; foodstuffs of vegetable origin; live animals; vegetable substances and non-manufactured fibres; wood and wicker both raw and manufactured (half in agriculture, half in manufactures);

Imports classified as manufactures:

Victoria:

Books; musical instruments; watches, clocks and watch-making materials; cutlery; building materials; furniture and upholstery; drugs and chemicals; carpeting; drapery; apparel and slops; bags and sacks (including woolpacks); candles; paper including paper bags; oil of all kinds; coal; earthenware, brown ware and chinaware; iron and steel (exclusive of railway rails, telegraph wire, etc.); fancy goods; stationery; machinery; sewing machines; tools and utensils; matches; paints and colours; woollens and woollen piece goods; linen piece goods and manufactures; haberdashery; boots and shoes; gloves;

hats, caps, and bonnets; hosiery; millinery; leather, leather ware and leather cloth;

woodenware; glass and glassware; jewellery; lead ore, pig pipe sheet; manufactures of

metal; tin; nails and screws; plated wire; hardware and ironmongery; oilmen's stores

Australia:

Apparel, textiles and various manufactured fibres; beverages, non-alcoholic only and the

substances used in making them; drugs, chemicals and fertilisers; earthenware, cements,

china, glass and stoneware; jewellery timepieces and fancy goods; leather and

manufactures of leather together with all substitutes thereof and also India rubber and

India rubber manufactures; metals partly manufactured; metals, manufactured including

machinery; metals, unmanufactured and ores; miscellaneous; oils, fats and waxes;

optical, surgical and scientific instruments; paints and varnishes; paper and stationery;

stones and minerals used industrially; wood and wicker both raw and manufactured (half

in agriculture, half in manufactures)

Imports classified as exotics:

Victoria:

Coffee; opium; tea; tobacco, cigars, snuff

Australia:

Tobacco and all preparations thereof

Customs revenues classified as agriculture:

Victoria:

Dried and preserved fruits and vegetables; hops; live stock; malt; rice; sugar and

molasses

Australia:

Agricultural products; wood, wicker and cane; sugar

Customs revenues classified as manufactures:

Victoria:

Coffee, chicory, cocoa and chocolate (divided by two, one half in exotics, one half in manufactures); all other articles; articles subject to ad valorem duties

Australia:

Apparel and textiles; drugs and chemicals; earthenware; jewellery etc.; leather etc.; metals and machinery; musical instruments; miscellaneous articles; narcotics; oils, paints, etc.; paper and stationery; stimulants; vehicles

Customs revenues classified as exotics:

Victoria:

Cigars; coffee, chicory, cocoa and chocolate (divided by two, one half in exotics, one half in manufactures); tobacco and snuff; opium; tea

Australia:

Special goods

Canada: Imports and customs revenues from 1877 to 1903 are taken from the *Statistical Yearbook*. After 1903 the data for customs revenues are only available on a high level of aggregation or by country. However, the trade volumes of the sessional papers of Canada provide customs revenues for the later years.

Imports classified as agriculture:

Animals; bones; breadstuffs; bristles; broom corn; butter; cane and rattans; cheese; corkwood; eggs; feathers; felloes of hickory wood; fibre; vegetables; fish; flowers; fruits;

fruits, preserved; fruits, dried; fur skins; fur, glucose and saccharine; grease; grease, rough; hair, cleaned; hair, horses; hatters' furs; hay; hemp; hickory and oaks; hickory billets; hides and skins; honey; hops; ivory nuts; lard; logs and round unmanufactured; timber; lumber and timber; malt; meat; molasses; oil, animals; oils, vegetable; other agricultural products; other vegetable produce; pickles; plants and trees; rennet; sausage; seeds; silk, raw; straw; sugar and syrups; sugar, maple; vegetables; wood for fuel; wool Imports classified as manufactures:

Army, navy material; articles for use of the governor general; bacteriological products; articles for the use of the dominion government; goods ex-warehoused for ships stores; fancy goods; fence posts; handle, stave; hickory spokes; hubs for wheels; manufactures; milk, condensed; mineral produce; miscellaneous; models of inventions and other improvements; others; paintings in oil or water colours; settlers' effects; shovel handles; sponges; wax

<u>Imports classified as exotics:</u>

Chicory; cocoa beans; cocoa nuts; coffee, green; coffee, roasted; spices; tea; tobacco; tobacco, unmanufactured

Customs revenues classified as agriculture:

Animals and food, total breadstuffs, grain, grain products, feather undressed, fish, flax, hemp and jute, dried fruits, fruits green, furs, hair, hay, honey, hops, lime, milk, mineral waters, mustard, fish oil, animal, vegetable, lubricating oils, plants and trees, provisions (agricultural), seeds & bulbous roots, sugar syrup and molasses, vegetables, waste or shoddy from cotton, beeswax, yeast

Customs revenues classified as manufactures:

Goods in crude condition, wholly or partly manufactured to be used in industry; manufactured articles; vinegar, salt, ashes, asphaltum, bagatelles tables or board, tallow, bags with contained cement, bags, barrels and other coverings, baking powders, balls, baskets, belts, bells and gongs, belts of all kind, billiard tables, shoemakers ink, blind of wood, blueing, laundry blueing, boats, ships, books, periodicals, bolsters, pillows, boot, shoe and stay laces of any material, boots, shoes and slippers, braces and suspenders, total bricks, clays and tiles, crapes, British gum, dextrin, brooms, buttons, candles, total carpets, 'carpets sweepers', total carriages, cash registers, celluloid, cement, church vestments, clocks, clothes wringers, cloth, coffee, chicory and chocolate (divided by three, two thirds in exotics, one third in manufactures); coke, coal, collars, combs for dresses, cordage and twine and manufactures of, cordage, cotton, corsets, corset clasps, costumes, cotton manufactures, curtains, curling stones, cyclometers, damaged goods, chemicals, earthenware and china, elastic round, electric apparatus, embroideries, emery wheels, fancy goods, featherbone in coils, feathers bone, fertilizers, fireworks, articles for fishery, foundry facing of all kinds, total fruits canned, glass, gloves, glue, grasses, fibres, grease, gunpowder, hats, caps and bonnets, ink, jewellery, knitted goods of every description, laces, leather and manufactures of, lime juice, machine card clothing, total marble, mattresses, brass and manufactures of, copper, metals, mosaic flooring, musical instruments, mineral oils, oil cloth etc, optical and philosophical instruments, packages, parcels, paintings, paints and colours, papers and manufacturers, paraffin wax, pencils, pens, penholders, rulers etc, perfumes, pomades etc, photographic dry plates, picture and photograph frames, pickles and sauces, plates (engraver's), pocket books, purses, musical instrument cases, precious stones, pulleys, regalia and badges, ribbons, rugs, sails, sand

paper, sausage casings, ships etc, signs and letters, silk manufactured, slate, soap, sponges, starch, stearic acids, stone and manufacturers of, tape lines, teeth artificial, tobacco pipes, trunks, bags, hat boxes, satchels, turpentine (spirits of), umbrellas, unenumerated articles, varnishes, vinegar, watches and movements, wax and manufacturers of, webbing elastic and nonelastic, webbing, non elastic, whips thongs and lashes, window cornices, window shades in the piece, window shade or blind rollers, wood & manufacturers, wool & manufacturers, miscellaneous, special duties, post entries, additional duties, post entries, manufactures total.

Customs revenues classified as exotics:

Cigarettes; coffee, chicory and chocolate (divided by three, two thirds in exotics, one third in manufactures); luxuries; spices; tea; tobacco, coconuts, gutta-percha, ivory Spices, tea, tobacco and manufactures thereof.

USA: Data were taken from *Statistical Yearbook*.

Import shares are available for wine and spirits separately, but just one aggregated value is available for customs revenues. Thus we assume that wine and spirits have the same tariff rate and split customs revenues using the import shares.

Imports classified as agriculture:

Animals; articles from Hawaiian islands: fruits and nuts; articles from Hawaiian islands: brown sugar; articles from Hawaiian islands: molasses; articles from Hawaiian islands: rice; bark; barks, cork bark and wood; barks, medicinal; bone and horn; bones, crude; breadstuffs; bristles; cork wood; cotton; dairy and meat; eggs; effleurage grease; feathers; felt; fish – total; fish bladders; flax, raw; fruits and nuts; fur skins; grains and ground;

hair; hay; herring; hide cuttings; hides and skins; honey; hoofs; horns; hops; horsehair; mackerel; malt, barley; moss, seaweed; oil cake; oils, vegetable; oils, whale or fish; olive oil, salad; olive oil, not salad; other fish; other flax; other hairs; other palm leafs; other seeds; potatoes; provisions; raw hemp; raw jute; rice – total; sardines; sausage skins; seeds – total; silk – total; straw and palm leaf; sugar; vegetables – total; whale and fish; wood, unmanufactured, not elsewhere specified; woods; fibres, vegetable and textile grasses; plants

Imports classified as manufactures:

Acetate; alizarin; anthracite; antimony; art works; art works, not elsewhere specified: paintings, in oil or water colours, and statuary; articles admitted free under reciprocity treaty with Hawaiian islands – total; articles for the use of religious, educational; articles, produced or manufactures of the US, returned; asbestos; asphalt; beeswax; beverages; bismuth; bituminous; blackings; bologna sausages; bolting-cloths; books and other printed matter, not elsewhere specified; brass, and manufactures of; brushes; burr stones; buttons, except of brass, gilt or silk, and buttonmolds, and button materials made in patterns or cut for buttons exclusively; carbonate; cast polished plate; cast polished plate silvered; caustic soda; cement; chalk; charcoal; chemicals; chloride of lime or bleaching powder; chocolate; clays or earth of all kinds, including china clay; clocks and watches – total; cloth; coal; cochineal; coir yarn; coke; confectionery; copper and manufactures of total, not including ore; copper ore; cordage; corsets; cotton - total, manufactures of; cutch or catechu; cylinder and crown; diamonds; diamonds, rough or uncut, including glaziers diamonds; dyewoods; earthen, stone, and china ware – total; emery ore; fancy articles – total; fans, except palm leaf; farinaceous substances, and preparations of, not

elsewhere specified; fertilizers; firecracker; fluted, rolled or rough plate; furs, manufactures of; glass and glassware – total; glass plates; gloves of kid; glue; glycerine; gold ore; grease; ground plasters, paris; gunny-cloth; gunpowder; gypsum or plaster of paris; hair, not elsewhere specified, and manufactures of hats, bonnets, and hoods, and materials for; hair man.; hats; hatters plush; household and personal effects and wearing apparel in use, and implements, instruments, and tools of trade of persons arriving from foreign countries, and of citizens of the US dying abroad; indian rubber and gutta-percha, manufactures of; indigo; ink and ink powder; iron - total, not including iron ore; iron and steel, and manufactures of; iron ore; jewellery; jute butts; leads; leather, and manufactures of leather -total; lime, chloride; lithographic stones; madder; man. shell; man. zinc; manganese; manufactured cork; manufactured hemp; manufactures of copper; manufactures of flax; manufactures of flax, hemp, or jute, or of which flax, hemp, or jute shall be the component material of chief value – total; manufactures of jute; manufactures of lead; manufactures of leather – total; manufactures of textiles; marble and stone; matches; matting for floors; meerschaum, crude; metals; mineral water; mineral substances; musical instruments, and parts of; nickel ore; oil, volatile or essential; oils – total; ore; ore, iron; other cast manufactures; other chemicals; other explosives; other manufactures of hemp; other manufactures of jute; other manufactures of leather; other manufactures of tin; paintings; paper and manufactures of; pencils; perfumery; pigs, bars, ingots; pipes; plaster of Paris, or sulphate of lime, ungrounded; platinum, unmanufactured; plumbago; potash; precious stones, not elsewhere specified, and imitations of, not set; printing papers; salt; saltpetre; silk, hosiery; silver ore; soap – total; soda; soda, bicarbonate; sponges; starch; sulphur; sumac; tar and pitch; terra alba; tin in

bars; total iron and steel; toys; umbrellas; varnishes; vinegar; watches; wood and manufactures of – total; wools, man.; writing papers; zinc

Imports classified as exotics:

Ivory; cacao; camphor; chicory; chicory root; cigars; cochineal; cocoa coffee substitute; guano; gums; gutta-percha; Indian rubber; opium; other manufactures of tobacco; other special articles; spices; tea; tobacco; tobacco and manufactures of leaf; vanilla beans

Customs revenues classified as agriculture:

Breadstuffs and other farinaceous food; flax; hemp; jute etc., fruits including nuts; sugar; molasses; wood and manufactures of (divided by two, half in agriculture, half in manufactures)

Customs revenues classified as manufactures:

Chemicals; drugs, dyes and medicines; cotton, manufactures of; earthenware and chinaware; fancy articles; perfumery etc.; glass and manufactures of; iron and steel and manufactures of; jewellery and precious stones; leather and manufactures of; manufactures of flax, hemp, jute etc; manufactures of wool; silk and manufactures of (divided by two, half in agriculture, half in manufactures)

Custom revenues classified as exotics:

Tobacco and manufactures thereof