出國報告（出國類別：考察）

2017年臺日友好交流會專題報告書

服務機關：財團法人中央畜產會
姓名職稱：黃董事長金城
派赴國家：日本
出國期間：2017/6/6-9
報告日期：2017/6/30

摘　要

為促進中日雙方畜產業界互惠交流,建立日本及臺灣畜產業更深厚的友誼，中央畜產會與日本農畜產業振興機構約定 2017 年 6 月於東京舉行第八次友好交流會議，設定研討議題包括「日本畜產品供給以及政策的動向」、「臺灣畜禽產品出口及品質管理策略」。另由日本農畜產業振興機構協助安排,拜會日本禽流感防疫中央及地方機關，包括日本農林水產省動物衛生課、國立研究開發法人農業・食品產業技術總合研究機構動物衛生研究部門(NIAH)以及千葉縣中央家畜保健衛生所，就日本對禽流感防疫的政策及措施交流。另拜訪獨立行政法人農林水產消費安全技術中心(FAMIC)，瞭解檢驗及認驗證制度，期能借日本的長處，並強化與日本農畜產業永續交流之管道。

訪日團於本（106）年 6 月 6 日至 6 月 9 日訪問日本，由中央畜產會黃金城董事長領隊，成員有邱創進執行長、王旭昌副執行長、陳聰賢組員等四人，全程由駐日經濟文化代表處戴德芳秘書陪同，王清要秘書亦抽空陪訪,另由日本農畜產業振興機構以公務車或租車接送，並僱用翻譯隨行，四天三夜緊湊行程，如原先規劃時程順利完成。

日本農畜產業振興機構由宮坂亘理事長率領近藤康子副理事長、小林博行總括理事、瀨島浩子調查情報部長、木下雅由調查情報部審查役及木田秀一郎調查情報部員等人與會，交流會議於熱烈討論下圓滿閉幕。於訪問過程中瞭解日本農林水產省動物衛生課的禽流感疫情處置措施及防疫政策、動物衛生研究部門(NIAH)生物實驗室業務及病毒檢測技術、千葉縣中央家畜保健衛生所地方防疫機關主要業務及疫情處置措施，以及獨立行政法人農林水產消費安全技術中心(FAMIC)執行認驗證及檢驗業務經驗。此行本會也提出與日方建立重大疫病如禽流感及口蹄疫等年度交流會議，建立禽流感區域防疫概念，並強化臺日間畜牧獸醫界的友誼與合作關係。

目錄

附件目錄

壹、與日本農畜產業振興機構交流

一、考察目的

(一)辦理本年度高層拜訪活動

(二)日本畜牧產品品牌建立與品質系統

1.品牌建立

(1)品牌建立流程

(2)國內產品的品牌化與產品差異性(地區化特色、特殊品牌、品質指標)

(3)消費者教育與消費信心建立

2.品質系統

(1)JAS、GAP、HACCP、GMP 對生產流程的導入

(2)品種、飼養管理、飼料或添加物特性

(3)產品標示規範

(三)日本擬修法引入外國農業專業技術人員之政策進度與規劃

1.政策執行進度

(1)政策沿革

(2)勞力開放作業進度(國內輿論、國會)

(3)執行效益

2.外國勞力管理

(1)聘僱條件執行方式

(2)與研習生制度差異

(3)是否可能推廣至非國家戰略特區

二、交流過程

本次活動係黃董事長與邱執行長任內首次與振興機構交流，也是宮坂理事長任內第二次互訪活動，雙方同感於兩國間地緣相近，且諸多農牧政策相似，在面對境內產業狀況及各國際議題變化，雙方有必要持續互訪，透過不同議題的意見交流及產業與市場經驗深度討論，期能協助政府達成政策目標。

為謀求日本農畜產品的穩定供應及其國內消費安全，振興機構依法成立，業務以畜產(肉牛、肉豬、酪農)、蔬菜、砂糖及澱粉為主，涉及範圍占全國農業產值 65%左右(2014 年約 7 兆日圓)，協助政府執行生產者經營穩定、供需調整及價格穩定、緊急對策以及資訊收集和提供。

在日本畜牧生產動向方面，2016 年養豬農戶約 4,800 戶，頭數約為 931 萬隻，近年持續緩慢下降，豬肉批發價格雖維持高水平，但生產業者高齡化引起勞力不足，同時畜牧業廢水排放標準的提升使經營條件變得嚴苛。國產約占總供給五成，進口則以美國、加拿大、丹麥等國為主，近期從西班牙進口也逐漸增加。振興機構執行的養豬經營安定對策(豚マルキン)中，訴求市價及生產平衡，當粗收益低於生產成本時，補貼其差額的八成，資金則由振興機構及養豬農家出資各半定存來支應。目前也正推動經營安定對策的法制化，用以替代原有指定食肉價格安定制度；產業團體也正檢討 check off 制度(近似我國產業服務費)的可行性，並逐步推導法制化，期望未來提升國產豬肉使用，如學校營養午餐使用國產豬肉的次數提升。

肉雞近年飼養與需求成正比而穩定成長，大規模飼養為其大宗；受需求持續增加，進口量與生產量都持續提升，國內生產占總供給六成五，其餘幾乎都進口自巴西，因此今年三月發生之巴西食安問題也在日本引起相當的騷動。在蛋雞生產中，飼養戶數為 2,440 戶，總隻數約為 1 億 3,500 萬隻左右，目前飼養規模在 10 萬隻以上的業者，飼養量已超過總體七成。日本雞蛋自給程度約為 96%，以新鮮可供生食的品質作為基準。目前由農林水產省主導對全國養雞團體實施雞蛋的經營安定對策，當雞蛋價格下跌時，政府以基準價格(目前設定 165 日圓/kg)為基礎補貼差額，同時也對生產成績來進行獎勵，利用雞群更新和空舍延長來調整生產量以達安定效果。

在肉牛飼養中，2016 年約 5.2 萬戶，飼養量約 248 萬頭。同樣受相關業者高齡化影響，飼養戶和飼養數都持續減少。國產牛肉占總供給量四成，其餘以澳洲和美國進口為主，國內生產量中和牛與雜交或乳用種各占一半。肉牛經營安定對策(牛マルキン)目前由振興機構負責，和養豬經營安定對策(豚マルキン)理論相同，由政府制定保證基準價格及合理化目標價格作為基礎衡量津貼。

為促進畜產業者的競爭力，農林水產省近年政策方針包含：強化團體收益能力(規模擴大、減少成本、提升附加價值)，協助農戶提升必要設施，考量人力不足，就產業特性進行分工化。擴大和牛生產及確保乳用子代牛，就和牛繁殖作業進行補助，並提升 ICT 設備的引入來協助生產，如智慧型手機。

強化對經營輔助的資金政策，令生產者經營壓力減輕。依不同產品進行輸出策略的研擬，透過分切及料理技術的推廣，使畜產品及對應料理更容易向海外宣傳。

日本政府積極蒐集目標國家情報以研擬產品策略，宣揚日本產食材以及日式料理(和食)的優異品質，並透過海外販售據點，促進日本農產品的出口提升。就整體農產品出口來看，日本政府除了在對海外宣傳的投入，同時也積極提升自有生產力及品質以謀求競爭力強化。

談到其國內農產品品牌的建立，日本政府積極打造農畜產品的產地品牌，農林水產省以生產者概要、飼料及飼養方式等特徵作為品牌基礎來指導，目前經公告的牛肉品牌共有 327 個，豬肉有 415 個。品牌化的過程透過 6 次產業化、地理性標示保護制度(GI 法)、GAP 及 JAS 等政策打造兼具高附加價值與可靠品質的專有品牌，同時令海內外消費者理解農產特色。2014 年 6 月，日本開始實行地理性標示保護制度，使國內產品在符合既定品質標準時得以標示地理性標示於市面流通，該標示為地區性共有財產，該地區生產者皆可使用，截至本年 5 月 26 日， 22 個地方單位共登錄了 35 個產品，其中牛肉有 4 項(前澤牛、米澤牛、特產松本牛及神戶牛)。

在畜產品 GAP 的推行，2017 年 3 月 31 日由日本 GAP 協會策定公布「JGAP 家畜・畜產品」，以乳牛、肉用牛、豬、肉用雞和蛋雞五品項為對象，就農產營運、食品安全、畜牧衛生、環境保全、勞工安全、人權尊重及動物福祉等項目，與其他 JGAP 適用相同基準進行審查及認證。近期在國會審議中的 JAS 法中，以制定、推廣多樣化農產品 JAS 規格，準備和國際通用的認證標準為主軸。將現有 JAS 規格對象由原有的產品品質擴大，納入製程、管理方式、測定及分析方法的規格，充實既有規格以利企業和生產者進行提案。同時為對應新的 JAS 規格，進一步設立符合國際標準化機構(ISO)程序之認證流程，並透過農林水產消費安全技術中心(FAMIC)的作業促使 JAS 規格成為符合國際適用之認證。

在農業外籍勞力議題，係透過內閣主導之國家戰略特別區域法(經查 6 月 16 日國會已通過修正，預計 9 月施行)，擬於特定區域引入於母國大學農業科系畢業或已於日本完成技能實習之外國勞力，為現有外國人技能實習制度之改良，引入勞力受地方農業協會指導及勞務派遣，得支領與日本人同等或以上之報酬。

在我方回應日方有關臺灣畜禽產品出口及品質管理策略部分，我國畜產品於亞洲區的出口為以熟食加工品(日本、香港、新加坡及馬來西亞)及清真認證產品(馬來西亞)為主，在美洲區以加工蛋品(皮蛋、鹹蛋)為主。在畜產品品質管理部分，以藥物殘留監測及屠宰檢查為基礎，所有畜禽上市前均經過獸醫師屠宰衛生檢查，以提供消費者衛生安全之畜禽產品。近年為能有效追溯傳統市場販售端之畜禽產品來源，更針對國產牛肉、雞蛋、豬肉、羊肉等產品進行追溯制度建立，並推廣國產標章(牛肉、羊肉及鮮奶)提供民眾辨

識選購國產品。出口畜禽產品大部分均有 HACCP、ISO22000 驗證，目前也推動 Global GAP 期能與國際接軌；國內部分則推廣臺灣優良農產品標章(CAS)及臺灣良好農業規範(TGAP)，同時於校園飲食推動 4 章 1Q 認證，包含：吉園圃安全蔬果標章 2.0、產銷履歷農產品標章、CAS 臺灣優良農產品標章、CAS 有機農產品標章以及生產追溯 QR code，提供消費者可追溯性的安全生產資訊。在有機畜產品部分，目前僅通過雞蛋、雞肉、奶粉等產品項目。

三、心得

臺日雙方在畜產品品牌化過程中，以生產者概要、飼料及飼養方式等特徵作為品牌基礎的概念相近，惟日本幅員較我國廣闊，再添加地理性標示保護制度(GI)和其他品質政策提升品牌附加價值，與歐盟地區 GI 制度或傳統食物認證制度(Traditional Speciality Guaranteed)相似，不僅於國內地區成為附加價值的參考，亦是推動出口時以地區品牌在海外提升知名度的手法。讓產品於海內外不再是單打獨鬥的展示自我，而是傾全國榮譽為國內產品增值的助力。

在面臨國內生產下降，且對國外進口的依賴上升，日本政府透過各種經營支援措施穩定生產條件與品質，藉由 6 次產業化及產業分工的推行，提升就業環境以及維持自給程度，連結農林水產省對養豬產業振興計畫的中心思想，促進國內循環經濟式生產，減輕對進口的仰賴，強化自有生產力與附加價值的提升可謂相輔相成，實為我國借鏡之處。

在農業外國勞力的引進，隨議案的通過，今年九月也將正式於經濟戰略特區施行，相較過去的技能實習制，於特區內的新制有助於外籍勞力工作權益的提升，在專業、大規模農業生產區域應有一定效益，日本政府內閣成員亦有不排除未來逐步開放特區外施行的看法，然而其國內保守意見對於開放勞力仍有相當反彈，新制尚有觀察空間。在產業現代化、自動化的發展過程中，勞力係不分國界必然面臨的問題，目前通過的制度以專業、即戰力為訴求，同為農業老年化的我國亦有相當困境，如何在產業轉型過程同時滿足即時勞力需求，實為兩難。

自 2010 年起，本會與振興機構的定期友好交流機制歷經逐年需求變遷，從產銷調節政策、國際貿易協定、加工產品進出口流程到防疫經驗交流，透過振興機構也將交流觸角延伸至其他日本產官學界，未來也將逐步擴展各相關畜牧領域的交流合作，期許能持續為國內農業政策執行及兩國產業間交流盡一份心力。

四、建議

國內產業近年推動品牌化不遺餘力，在地方政府的支持下可謂多點開花，品牌化過程中提升附加價值，促進令人安心、品質安全的畜禽產品生產、刺

激消費市場選擇我國優良產品，並與進口產品做出區隔，提昇國產品的競爭力，同時配合政府 6 次產業化的推動，應能帶領產業現代化的改革，政府及民間研究機關也應積極投入畜禽產品改良的研究並公布生產業者，根據需求的多樣化促進新商品的開發。

受農村人口外移、農業人口老化的影響，我國畜牧業近年持續建請政府主管機關考量引進外籍勞力之可能性，惟農業目前開放專業外籍人士僅獸醫相關，一般勞力僅漁業及屠宰業，尚未開放直接投入畜牧生產的即時勞力。查日本政府推動經濟戰略特區改革時，係參考地方生產組織對農忙時引入具專業技術或完成實習資格者之建議，我國農業生產同樣受季節性缺工影響，主管機關亦於近年投入農業專業技術團試辦計畫，經農業專業技術訓練培訓農業師傅、農務士等專業人員，此舉不僅紓解勞力缺口，亦有提升國內就業機會，值得期許未來擴大施行，然現有規劃服務區塊偏重於農糧生產的農忙期，在賡續性的畜牧生產也應逐步投入對應規劃，或依現有酪農實習計畫改良，配合技術訓練，穩定生產品質，改善畜牧業生產條件。在國內尚未開放外籍勞力時，畜牧產業亦須自主提升生產現代化、自動化的改革，循序漸進解決人力問題，切勿因一時紓解勞力缺口而降低了生產品質。

我國近年受颱風及極端氣候影響，在葉菜類及蔬果品項容易於短期內劇烈震盪，然振興機構協助日本政府執行之產業調節及經營安定對策亦涵蓋蔬菜業務，此節建議我國農糧署所司部門透過中央畜產會與日方進行交流，就政策經驗進行討論，期能為我國農業生產建立穩定經營制度。

本會與振興機構定期交流機制迄今邁入第八年，對海外畜牧產業的交流日益頻繁，應利用現有交流機制積極拓展討論議題面向，因應產業需求探詢各產業交流機會，且將歷年交流資訊系統化保存並分享與產業同仁，同時會內應積極培養語言人才以及經驗的傳承，促使本會職能永續發展。

貳、與農研機構動物衛生研究部門交流

一、考察目的

(一)瞭解禽流感病毒檢測技術

1.紅血球凝聚抑制反應試驗(HI 試驗)

2.H5 及 H7(亞型)的特異基因檢測

3.其他檢測技術

(二)瞭解生物實驗室業務內容

1.動物衛生試驗及藥品、血清研究

2.其他畜牧傳染病支援業務

3.其他食品相關檢驗技術

二、交流過程

筑波市國立研究開發法人農業・食品產業技術總合研究機構(National Agriculture and Food Research Organization，NARO，簡稱農研機構)，依其組織可分食農經濟推進、種苗管理、生物系特定產業技術研究支援、地區農業研究(北海道、東北、中央、西日本、九州沖繩)、果樹茶葉研究、蔬菜花研究、畜產研究、動物衛生研究、農村工學研究、食品研究、生物機能利用研究、次世代作物開發研究、農業技術革新工學研究、農業環境變動研究、高度解析中心、遺傳資源中心等部門，係農林水產省整合所屬之國內農業試驗研究機關成立的綜合研究中心，主辦農業、食品產業相關技術(包含

蠶絲相關技術)以及特定生物產業技術的實驗與研究業務，同時對相關技術進行改良。

本次拜訪所屬的動物衛生研究部門(National Institute of Animal Health，NIAH)，其主要業務為動物衛生之相關技術、試驗與疾病預防治療之研究開發，畜禽專用之血清與藥品開發與分配，動物衛生相關研究、鑑定與宣導業務，功能與我國淡水家畜衛生試驗所相近，且過往曾有合作，檢驗項目亦受世界動物衛生組織（OIE）指定為參考實驗室。

動物衛生部門協助農林水產省與環境省(與北海道大學、鳥取大學同受指定為案例確診單位)進行野鳥監控，在 2016 年起的 HPAI 被認定由候鳥傳導，傳播途徑遍布日本海區域及飼養場周圍水域等高風險區域，依環境省「野鳥における高病原性鳥インフルエンザに係る対応技術マニュアル(野生鳥類高致病性禽流感應對技術手冊)」指示，地方機關於 10 月至 4 月期間(10 月為全國統一檢查，其後 2 月進行一次)定期採取野鳥糞檢驗(每個研究點約 100 個糞便樣本)及年間定期回收野鳥屍體之氣管與泄殖腔拭子(疫情爆發時加強採樣)，或依環境省指示採取環境樣本，同時依應變等級設置野鳥重點監視區域(以樣本分離出禽流感病毒的發生地方圓 10 公里為基礎)，各地採樣時先以簡易測試進行檢測，若為陽性則將檢測材料(拭子)傳送至環境省指定案例確診單位進行進一步檢測，若簡易測試為陰性，再將測試材料送往環境省指定的基因檢查機關，再次測出為陽性者則送至指定案例確診單位，若否則結案。

在疫病期間，動物衛生部門接受各地樣本後，以血球凝集素（Hemagglutinin，HA）及神經氨酸酶(Neuraminidase，NA 亞型)、基因序列、病毒分離等檢測，進行病例最終鑑定，並將案例通報農林水產省(野鳥部分通報環境省)，由其通報 OIE。比對近期病毒案例，至少四種病毒株同時於韓國被檢測出，然而近期 H5N6 相對過往 H5N1 病原性較弱。日本鴨隻飼養場較少（本次疫情中僅 2 案例），與臺灣鴨場感染後持續帶原影響鄰近區域不同，由於境內肉雞飼養朝大規模化發展，飼養密度低的環境有助鎖定目標以掌握傳播速度。

在我方回應動物衛生研究部門的部分，2017 年高雄臺商禽流感病例為境外移入(中國)，該案例於 1 月 25 日返國，確診後隔離治療並追蹤接觸人員(共 108 人次)，醫療單位每日回報病例治療狀況予疾管署管制中心，然而我國於 2017 年家禽場流感案例無 H7N9，尚無人禽間互傳風險。我國衛生單位亦針對相關作業人員進行健康監控：對於作業人員或雞場人員有感染禽流感之虞時進行抗病毒藥之預防性投藥。作業人員事前接種人流感疫苗，避免人禽流感病毒基因重組。作業人員及其家人須進行自我健康管理，有流感症狀、呼吸道疾病或眼睛感染症狀者應主動通報衛生局(法定傳染病監視通報系統、傳染病問卷調查管理系統)。針對作業人員及動物防疫人員進行血清學調查。

三、心得

本次討論到今年在日本及韓國的 H5N6 禽流感疫情結果大不同，共同的結論是 1.日本百姓對疫情通報非常守法，雞隻稍有異常就通知獸醫檢查，這也是教育的問題，所以日本與臺灣同只爆發 12 場 H5N6 就結束，而韓卻發生一波又一波的疫情，甚至到現在六月份疫情尚未結束。2.日本國內很少養鴨場，所以病毒帶原的問題較少，而臺灣有太多的鴨場，案例場清淨過程中可能受保毒禽類反覆感染，日本多數案例為雞隻，只要感染症狀都很明顯也容易清除，日方也認為這是較幸運之處。3.日本的養雞場規模較大，因此飼養密度較臺灣低，傳播速度較易掌握，臺灣密度較高易於傳播。

事實上日本動物衛生研究部門的研究比我國家畜衛生試驗所深入，我國相關部門應加強與其溝通交流。另討論到口蹄疫及豬瘟，日本已完全清除此二病毒，提及平常是否有做抗體監測，該部門回應完全沒有，在無抗體情況下若有此二病，一定會非常嚴重，所以不用監測。就鄰國的經驗也應作為後續我國疫情清除策略的擬定參考。

四、建議

在疫情爆發期間，投入人力與檢驗設備的齊全是防疫措施及效率的重要環節，在面對疫情大量爆發時，除具備對應人力外，亦需有緊急調配方案，臺日同為鳥遷徙影響區域，在過境帶來的各種傳播病隨病毒異變或來源種類不同，需要投入更多專業技術資源。在日本入侵路徑依野鳥及家禽各自由環境省及農林水產省訂定處置措施，農研機構動物衛生研究部門在其中皆擔任確診檢驗單位，然而在野鳥疫情處置則與與北海道大學(獣医学研究科微生物学教室)、鳥取大學(鳥由来人獣共通感染症疫学研究センター)分攤檢驗壓力，同時針對病毒資訊建立公開資料庫提供參考，入侵路徑、疾病出現與監視體制的研究，國內部門或可適度研討與畜牧獸醫相關校系合作分攤流行病學調查與檢驗工作，提升投入研究專門人才，並與國際接軌以擴大防疫網。

延續動物衛生部門與我國家畜衛生試驗所的研究交流，兩國間應定期就防疫檢測技術等議題交流，將研究成果分享於產官學界，提升我國防疫意識以強化產業防護網。

下半年在我國舉開之雙邊防疫政策交流研討會中，擬邀請動物衛生研究部門的專家來臺與會，分享日本畜禽疾病診斷經驗與我國畜牧防疫從業人員。

參、與農林水產省消費安全局動物衛生課交流

一、考察目的

(一)日本禽流感疫情處置相關措施

1.疫情處置

2.通報系統(時效性、稽查點)

3.疫情分級機制

(二)農民支援

1.復養政策(空場消毒、復養資格)

2.資金支援(撲殺補償、保險制度、互助金)

3.畜產品產銷支援(消費信心重建、價格安定策略)

(三)流行病學調查

1.執行單位(動物防疫機關、學校、專門研究機構)

2.調查內容(病毒入侵途徑、案例場、野地、病毒資訊)

(四)防疫資訊宣達

1.教育訓練、防疫演習

2.資訊報導業務

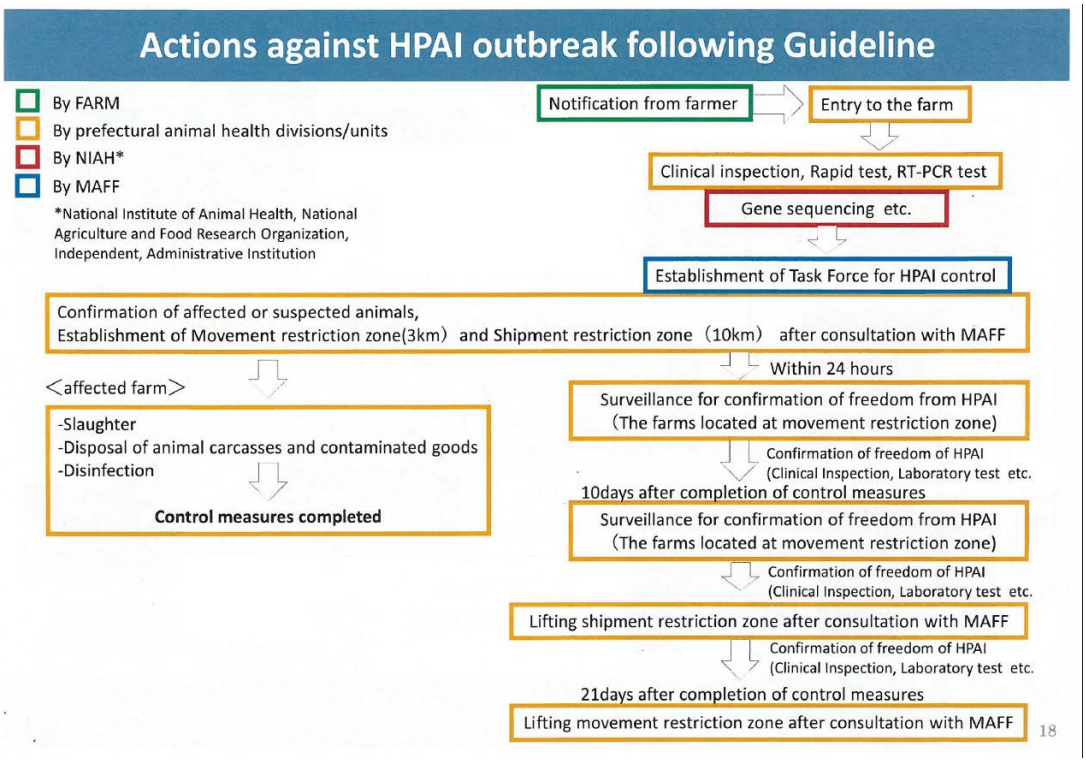
(五)防疫政策交流

二、交流過程

在日本四十七個都道府縣中，共 170 個家畜保健衛生所，合計約 2,084

位獸醫，依據其家畜傳染病預防法之規範，每年將對農場施行定期檢查、生產狀況諮詢，若不合相關規範標準且未於期限內改善，對政府監控畜牧傳染病未即時通報者，則依法罰緩，甚至面臨無法補償的狀況。在日本境內，對特定畜牧傳染病的處置方針分作，預防：於農場遵守嚴格的衛生生產條件、邊境管制；早期應對：監控疫情狀況(主、被動)、早期偵測與通報；疫情抑制：病畜撲殺、消毒、移動管制及環境檢測，各畜牧品項皆以農林水產省動物衛生課建立之飼養衛生管理基準強化農場生物安全體系。

在禽流感預防方面，分作野鳥監控、強化生產者團體間聯繫、各地家畜保健衛生所對轄內家禽的監控(初期檢測與症狀通報)、強化農場生物安全體系(抑制病原傳播)、邊境檢查(疫)以及鄰近國家的疫病爆發資訊的蒐整周知。每年固定由農林水產省定期至各地方政府做防疫研討，年間進行 400 餘場次的研習及實務演練(人車消毒、掩埋流程等)。在日本撲殺禽隻屍體依各地條件不同，採掩埋及燒燬處置。



在地方政府接獲疫情通報時，除周知疑似場半徑三公里內之飼養場，亦配合警察、自衛隊等單位進行移動管制及設置檢查點。在農林水產省公告案例確診後，保健衛生所也會進行區域內的檢測，並進行媒體的通告。在 2004 年疫情爆發時，京都地區曾有案例場遭受匿名通報指稱其隱匿家禽異常死亡狀況，並持續有活雞與雞蛋流入市面，在當時官方公布通報場資訊時，許多媒體從業人員突破管制進行鄰近區域採訪，更甚至出動直升機進行拍攝，不僅造成周遭區域恐慌，也間接提升疫病傳播可能，該案例場前場主夫婦知情不報引起各方嚴厲指責，相關單位甚至暗示追究其刑事責任，導致該夫婦飽受輿論壓力後自縊身亡(請參閱淺田農產相關事件)，案例場主後續依其家畜傳染預防法未盡通報義務乙節，遭判刑確認(求刑一年，緩刑三年)，農場經

營連帶影響下，於隔年申請農場破產倒閉，令人不甚唏噓。據此經驗，在日本政府修正通告過程中將保護個人資料以防洩漏，避免媒體相關人士自行採訪而造成疫情蔓延的可能，並禁止自行前往疫區採訪，須由農林水產省統一發布訊息(對案例場敘述僅公布所在地、飼養品項、飼養規模)，避免資訊混亂造成社會恐慌。

在民風嚴謹的日本境內，畜牧業者除依法定規範生產外，同儕壓力亦相當大，彼此監督，主動通報效率相當高，讓政府即時掌握疫情傳播的狀況並迅速應對撲滅，實乃近年間疫情均能有效控制之根本。

2016 年 11 月迄今，日本境內發生 H5N6 確診場數為 12 場，共計撲殺 167 萬隻家禽，以肉雞和蛋雞為主。去年十一月，安倍總理大臣針對此次疫情指示，全國農戶應做好各預警及應變措施以防範 HPAI 傳布、集中蒐集各感染案例資訊、農林水產省和相關部會應緊密配合、施予必要措施並提供社會大眾準確即時的疫情訊息。

疫病發生時，農林水產省將支付全數撲殺隻數的補償額，在移動管制間所受到的銷貨損失，也由農林水產省和地方政府比例各半補償。在案例場重新引進禽隻的流程中，經過密集的全面消毒後(撲殺後間隔一週，施行三次以上的農場消毒)，由動物衛生研究部門(NIAH)進行環境的檢查(禽舍地板、牆壁、天花板等處之採樣以進行病毒分離檢查)，同時引入哨兵雞檢測(每禽舍原則配置 30 隻以上，引入起 14 日後進行臨床檢查、病毒分離與血清檢查)整體環境是否清淨後，由動物衛生課發布是否准予復養。復養流程中，農林水產省及振興機構也備有緊急措施給予經營者支援，對農戶的經濟支援，除了補貼外，也包含保險制度及貸款支援。

交流過程中，我方亦回應我國防疫政策以及撲殺後屠體處置措施，在強化預警機制中，依家禽場風險高低加強主動監測，監控化製數量與屠宰衛生檢查異常情形以追蹤，強化邊境檢疫與走私查緝，密切注意候鳥遷徙路徑與海外疫情資訊，加強家禽業者與獸醫師教育宣導，提供畜牧業及防疫人員流感疫苗接種，向民眾宣導禽肉與蛋品熟食及衛生安全習慣養成且勿接觸禽鳥或屍體。在防疫因應機制中，各地方政府依據「H5、H7 亞型禽流感防治措施」督導家禽場改善硬體設施，並與中央政府聯合稽查；持續推動禽蛋燻蒸證明及運輸車輛及裝載箱籠清洗消毒等措施，並配合家禽健康證明書、地方防疫人員採樣監測以及獸醫師於屠宰前後的屠宰衛生檢查強化禽場健康狀況查察；鴨隻經檢測陰性始得上市屠宰，加強查驗家禽健康證明書及鴨場檢驗報告；提升跨部會協調機制，保持聯繫管道暢通，與地方政府整備轄內人力、物資、動物撲殺及屍體處理量能進行編組規劃，密切監測相關從業人員健康狀況，在急性呼吸道感染症狀時，主動通報衛生機關以協助就醫。在動物屍體處置措施，依據動物傳染病防治條例之規定，可以燒燬、掩埋或化製等方式處理，惟環境因素影響，現行以燒燬或化製為優先處理方式。

動物衛生課熊谷法夫課長強調，日本政府擬定 2020 年前達成 1 兆日圓

的農產出口實績並非僅有日本國內的努力，而是整個亞洲鄰近區域互相的支援才可能達成，對於各國間疾病和飼養的交流更是不可或缺。

三、心得

臺日兩國對疫情處置措施相近，防疫首要在疫情早期與飼養者之通報機制建立，目前日本主動通報撲殺是全額補償，而未主動通報導致疫情擴散則依其「家畜傳染病預防法」施予必要罰則。日本處於候鳥遷移重要位置，幾乎每年都有 HPAI，但都能有效清除，關鍵在於主動通報。

禽流感每年透過候鳥自西伯利亞地區經日韓輾轉入侵我國家禽業，在這次 H5N6 的疫情中，韓國案例場較多，日本與我國現為 12 起案例。比起本次 H5N6 的疫情處置，在我國 2015 年的 H5N2 千場以上的案例爆發，不僅處理速度慢，更亦造成經濟及產業結構的影響。我國養鴨場數量相較日本高出甚多，每年又受約 25 萬隻候鳥遷徙過境影響，疫期的延長或是病毒的變異皆容易造成國人的不安，能和鄰近國家的防疫單位增進交流是相當好的經驗，也希望農委會所司單位未來和日方進行疾病資訊定期交流。

在其他畜牧疾病議題，我國政府期許能依序清除口蹄疫及豬瘟，近三年已無發現口蹄疫活毒，今年向 OIE 申請通過非疫區，預計明年七月停止施打疫苗，針對日本已完成清淨狀態的經驗是我國值得加強交流的區塊。

四、建議

本次交流探得日本畜牧戶對政策的高配合度係近年疫病迅速控制的基礎，同時受其主管機關與振興機構的支援，農戶在平時或疫病發生時可受到經營安定策略、緊急對策、全額撲殺補助、移動管制損失補助及經營貸款支援的保護，相對我國在疫病未發生時，以自由市場機制令產業自主管理，疫情發生時，提供部分撲殺補助、移動管制損失補助與經營貸款支援，或依案例需求啟動專案補助，相較而言我國較日方少了農戶經營安定的協助，以我國豬肉、禽肉的高自給程度，市場狀況容易受疫情等突發狀況形成淺盤經濟效應，過多的補助或價格抑制易形成干涉市場，或有市場機制破壞之危殆，主管機關應衡量國內各畜牧產品市場機制，並參考各國穩定價格政策，推導適合我國環境的經營安定政策。

與日方初步達成共識，日後日本農林水產省動物衛生課及筑波的動物研究部門及農畜產業振興機構願意與我國農委會畜牧處、防檢局、家畜衛生試驗所及中央畜產會加強深入溝通及分享疫情資訊及防疫政策經驗。

擬於今年 10 月在臺灣舉辦專家意見交流，日本專家願意提供他們口蹄疫撲滅過程與經驗，以及每年撲滅禽流感的經驗，希望我國專家能從這樣的交流過程中得到該國經驗與處理疫情的態度。我國應更積極與各國專家交流，藉此提升國家能見度與角色，此節請防檢局、畜衛所及中央畜產會積極參與。

肆、與農林水產消費安全技術中心交流

一、考察目的

(一)該中心業務目的與沿革

1.該技術中心成立目的及發展沿革

2.該中心是否曾整併其他業務機構

(二)該中心現有執行業務

1.該機構現有認驗證項目及輔導業務為何

2.作為 JAS 制度認證機關，如何就國內食品安全把關

3.該機構於肥料、農藥、飼料、食品(原產地)等檢驗業務與檢驗技術為何

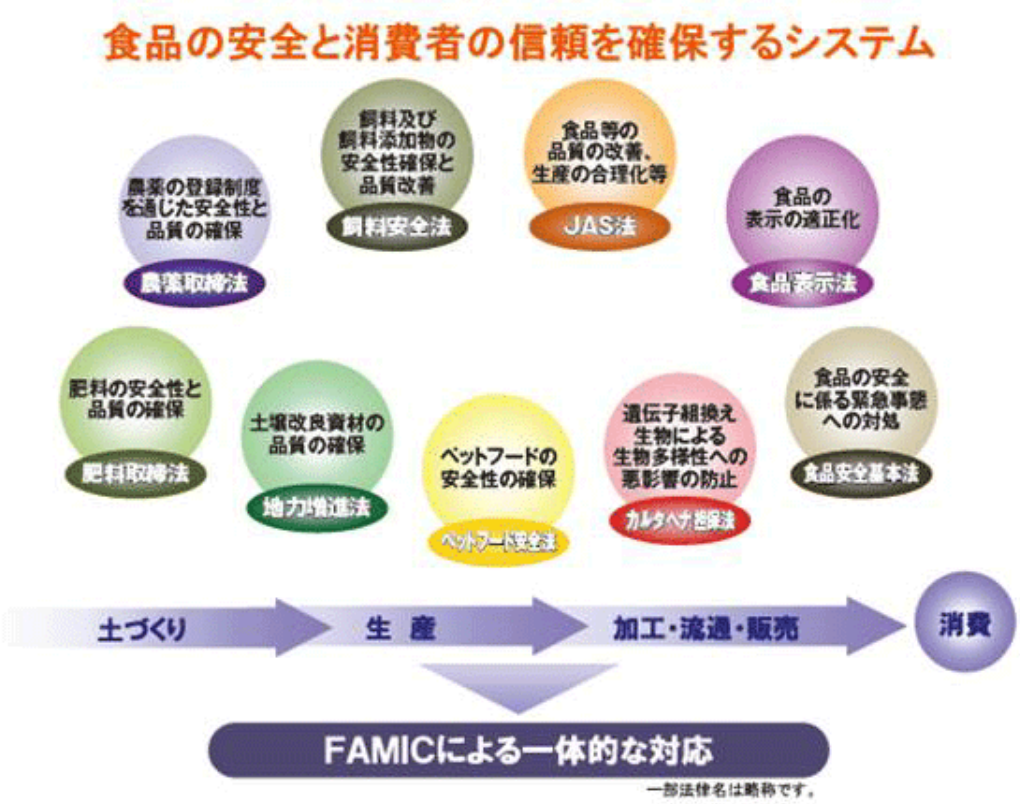
4.在肥料規格及飼料分析等基準建立流程

5.與 OIE/ISO/Codex 合作機制為何

二、交流過程

獨立行政法人農林水產消費安全技術中心（Food and Agricultural Materials Inspection Center，FAMIC，以下簡稱技術中心）本部位於埼玉市，為保護消費者利益，技術中心針對農林水產品及食品、飲料類和油脂類的品質與標示進行研究和分析，同時針對農業資材進行檢驗，包含肥料、農

藥、飼料、飼料添加物以及土壤改良資材，以確保農業生產的安全及品質的優化。隸屬於農林水產省，並受其委託進行飼料、肥料及食品的抽樣檢查，包含各種毒素、有害物質及 BSE 檢驗，分析樣品是否達到法定安全標準及食品標示規範。



在食品標示檢驗中，以穩定同位素及 DNA 技術進行產品檢測，是確認成分標示與產地差異重要途徑。技術中心在檢查農產品原產地標示時，除進行 DNA 實驗的數據判定，同時以生產者資訊或進口商社提供之產品相關資訊佐證判斷，所檢驗之 DNA 特徵也將記錄於資料庫，作未來檢驗追蹤比對使用。

本會亦有使用穩定同位素檢驗技術進行豬肉原產地特徵研究，但尚有待突破之處，經討論或有可能受原產地飼料成分影響，如：臺美皆以玉米為飼料主配方，在檢驗中難以區隔差異，臺歐間產品可透過檢驗區隔，推測可能是歐洲飼養方式以小麥為主成分，因此產生差異；以肉豬而言，全球普遍飼養品種並無太大差異，日方亦認同飼料因素或為研究突破點。

在肥料的微生物含量，日本有肥料相關的法律，但並未規範用量標準，一般而言也難以追蹤掌握，就生物肥料而言，部分產品含有 EM 菌(Effective Microorganisms,有用微生物群)，土壤改良劑中，少部分使用 VA 菌(Vesicular-Arbuscular)。

在 JAS 業務方面，目前以品質、成分、性能標準化的規格為主，另有生產方式標準化的規格以及流通方式標準化的規格(目前雖有規範，但仍無通過品項)，JAS 標章不限於國內產品原料，業主若有需求可提出驗證申請（進

口原料），通過即可掛上 JAP 標章於產品上，然而僅有 JAS 標章，其販售價格和一般產品其實無明顯差異，有機產品價格約為一般產品 1.5 倍，在取得有機產品標章前，須先完成 JAS 驗證。市面上 JAS 產品是針對單一商品進行檢驗，不包含追溯性，其生產資訊另行登錄於其他系統，在市場上出現疑慮時另有可追溯的資訊。

在飼料檢驗實驗室檢驗過程中，技術中心依據農林水產省訂定之「飼料及び飼料添加物の成分規格等に関する省令」分析飼料及飼料原料是否合乎標準，進行 ELISA 及 PCR 等檢測。目前日本政府規定不得於牛用飼料中混入骨粉，在豬、雞用飼料則可。飼料原料須通過農林水產省認可單位的檢驗才可使用，若為人食用的原料，則須通過厚生勞動省認可單位檢測才可使用。若需使用基改飼料原料，則須通過食品安全委員會特殊述明的條件。實驗室中目前可分析出 6 種黴菌以及 132 種農藥的殘留。在檢驗過程中，飼料約有 1-2%含有沙門桿菌，以動物性蛋白為多，國內外的樣品皆有驗出。

在放射性檢查實驗室，技術中心除本部外尚有仙台、神戶兩處放射性檢查實驗室，每年接收農林水產省 120-130 件樣本進行檢測，每次實驗約 2,000 秒可得檢測數據，就農林水產省採集之飼料(飼料部分亦有送往日本科學飼料協會檢測)、肥料以及汙泥樣本測試，樣本皆來自於國內，近年雖曾有東日本大震災事件發生，但送到技術中心的檢測並無超標紀錄。

在食品產地實驗室進行農作物產地檢測中，透過鍶(Strontium, Sr)的穩定同位素含量比例來進行判定，農作物生產過程中自土壤吸取養分，而各地土壤中 Sr-87 與 Sr-86 含量比例不同，透過感應耦合電漿質譜分析儀(二重收束型誘導結合プラズマ質量分析裝置，HR-ICP-MS)分析，若與對照組雷同的土壤結構，則配合其他金屬含量檢測數據，以判定產地特徵與食品標示是否相符。

在成份檢查(食品標示)實驗室中，以蜂蜜純度檢測為例，利用花蜜來源植物(C3、C4 類植物)固碳方式的差異，分析碳同位素(C-12、C-13)存在比例以判斷蜂蜜添加糖的可能。在鰻魚產地的檢測中，透過 ICP-AES/ICP-MS 等分析儀器，就檢測樣本所含標的元素濃度(可檢測到 10ppt 的精細程度)來判定國產品與進口品差異，然而判定結果仍有邊緣地帶，仍需輔佐其他諮詢完成檢驗。

目前技術中心與 OIE 的合作是在有害重金屬、黴菌以及農藥殘留的檢測，受農林水產省委託檢驗國內市場從原料到加工成品的樣本，並無接受民間委託。受農林水產省的委託樣品，主要對麥、玉米以及馬鈴薯等飼料原料進行檢測。

三、心得

本次拜訪的技術中心係日本飼料、肥料等農業資材以及食品檢驗重鎮，

受農林水產省委托進行全國抽樣檢查，包含各種毒素及有害物及 BSE 檢驗，其中對於不同來源農產品的原產地確認更是我國可借鏡的，例如過往自越南進口之農產品可能含有來自中國產品的分析，應為我國同領域檢驗技術的重要參考經驗。

該技術中心業務領域自土壤、農業生產、加工流通販售乃至消費端皆有觸及，在我國相似檢驗機關則分屬不同部門；本會於屏東的技術服務中心亦有相似機能，然而從屬農林水產省的技術中心得專職於委託檢驗，不另接受民間檢驗案件，顯見其在資源充裕條件中，仍有餘力進行技術開發，本會在財務自主的先決條件下，一方面需要自行開拓客源，在技術提升的部分，目前仍須和學校團體進行研究合作或相關政府單位的科技計畫委託執行。

四、建議

為配合農委會加強進口及國產雞肉及豬肉區隔之措施，自 2013 年本會與臺灣大學及中興大學等專家進行以粒腺體 β- 羥基醯輔酶 A 去氫酶（ β-hydroxyacyl-CoA dehydrogenase, HADH）活性鑑別方法(簡稱酵素法)之研究，次年亦制定對應檢驗方法(雞肉與豬肉) 並將列入 CAS 驗證產品之檢測項目及國家標準，2015 年起亦投入穩定同位素測試雞肉、豬肉、牛奶等產地判定之研究。以設備而言，本會亦有日本技術中心具備之研究環境，未來仍須持續加強與學界或跨國合作，提升自有檢驗技術。

建議本會技術服務中心未來有效利用進駐農業生物科技園區的機會與資源，仿效日本技術中心多元且縝密的業務執行，打造本會檢測實力。本次赴日係本會首次造訪技術中心，未來在穩定的交流機制中，尚有許多合作空間，期許未來在不同的交流活動中，可提升同仁於業務執行的思維，妥善盤整現有資源以開創本會新格局。

伍、與千葉縣中央家畜保健衛生所交流

一、考察目的

(一)地方防疫機關(家畜防疫員)主要業務與疫情處置措施

1.疫情發生等級如何判定

2.不同等級狀況，地方政府與家畜防疫員作業及通報流程

3.採樣判定後發動處置及處置權限

4.患畜、疑畜處置(移動管制、人道撲殺、屍體處理、銷毀)

(二)檢測技術

1.採樣後檢測流程

2.H5 及 H7(亞型)的基因檢測(PCR 及 RT-PCR)

3.血清抗體檢查

4.病毒分離檢查

5.其他檢測流程

二、交流過程

千葉縣內共有四處家畜保健衛生所(中央、北部、東部及南部)，隸屬於千葉縣政府，四所獸醫合計約 60 人，負責縣內約 1,500 戶畜禽牧場。2010 年，中央家畜保健衛生所負責縣內 136 戶乳牛戶（約 6,500 頭），53 戶肉牛戶（約 850 頭），16 戶養豬戶（約 25,800 頭），29 戶蛋雞戶（約 140 萬隻，肉雞未統計），所內 22 名獸醫所執行業務相當繁重，包含佐倉分所特有之病性檢驗，但仍努力維持和農戶的緊密連結。

中央家畜保健衛生所設庶務課、衛生指導課及防疫課。衛生指導課負責家畜衛生指導、家畜改良指導、動物用藥指導與監督、獸醫體系整備、畜產品相關物料的安全性確保(農藥殘留檢測等業務)、環境安全與改良。在防疫課部分，進行法定監視傳染病的檢查(回報)、病性鑑定(疾病、死因及其他急性疾病分析)以及輸出入畜牧產畜禽的檢查。蒐集各項有關影響經濟發展的傳染疾病情報、協助農戶施行疫苗及防疫策略的擬定，防疫業務中，進行法定監視傳染病的回報、透過場區檢查、病性鑑定、分析中毒或死亡原因及其他急性疾病的分析，特別是禽流感、口蹄疫、霍亂等疫病。

佐倉分所隸屬於中央家畜保健衛生所，分所內分病理生化學課及細菌病毒課，主要業務為病性鑑定(縣內僅此分所執行本業務)、斃死牛 BSE 檢查、疫病調查及預防業務及飼養衛生技術的宣導。

本次交流重點的禽流感疫情在日本四階段分級來應對，第一級為鄰國發生，第二級為國內發生，第三級為鄰縣發生，第四級為縣內發生，由平日應對措施逐步強化。

保健衛生所在禽流感發生前的平時對策：1.平時積極蒐集鄰近諸國的疫病發生情報，立即通報國內外疫情現況，以傳單或其他宣導方式，去年在中央家畜保健衛生所便發行了 26 次宣導，透過情報提供來提升轄內區域防疫意識。2.防治病原體侵入農場，農戶出入須進行人車消毒，徹底遵守法定飼養衛生管理基準，保健衛生所一年至少會進行一次突擊檢查，一旦發生異常，將持續輔導至改善為止。3.異常家禽徹底通報，飼養者回報之每週死亡隻數以及家禽異常死亡通報，保健衛生所藉此及早把握生產異常，千葉縣以傳真為主要通報方式，電話回報為輔。4.境內主動監控，在平時選定境內 12 戶蛋雞農場進行每月一次檢查，在 5-10 月禽流感好發期間追加另 32 場家禽農場，以鄰近有水域的場次進行優先選定，其餘依地區分布以及農戶意願選定；同時掌握縣內病毒入侵狀況，10-3 月就縣內的湖沼水域野鳥、候鳥是否帶原的檢查，自 2006 年迄今，檢查了 6,684 件樣本(野鳥糞)，但只有 2014 年 11 月時分離出兩件 H5N8 亞型病毒株。5.整備發生疫病時的動員機制，縣內每年都會就防疫作業從事者動員名簿進行整備，在禽流感疫情發生時可動員約千人進行防疫處置，其分配為縣內農業局約 600 人，其他部會約 400 人，人員將定期進行全縣或各轄區的研修。6.防疫作業從事者的實務演練，縣內每年進行數次對從事者的演習訓練，病禽處置、燒燬掩埋處置、場內消毒等訓練，同時縣內防疫對策本部及各保健衛生所將定期補充相關防疫耗材，保有足以應對 6 萬隻疫情的耗材庫存。

在禽流感疫情發生時的對應：1.保健衛生所接受死亡異常通報後立刻前往農場確認臨床狀況，進行簡易式檢測後，若檢測為陽性，則進一步取氣管及肛門拭子樣本等必要病性鑑定之樣本送至佐倉分所作 PCR 檢測，向縣級畜產課通報並請疑似農場進行管制。2.在佐倉分所中進行 A 型流感病毒檢查(PCR)，呈現陽性者則依法定防疫指針進行後續措施。3.縣級畜產課接獲疫

情通報後，向縣級農林水產部長以及知事(地方首長)進行報告，向中央政府以及各家畜保健衛生所周知，著手防疫對應措施，成立對策本部的設置。當病毒分離成疑似病例時：1.由佐倉分所製作病性鑑定材料，病毒接種之胚胎蛋以及尿囊腔液送至動物衛生研究所進行後續檢測，檢測過程中，全國各保健衛生所將會各自建立資料庫進行追蹤，除卻含有個人資料、地區農家資訊外，其他訊息由全國互通。2.由縣級畜產課通知中央政府及鄰近縣府，議定國境內限制移動的範圍，由中央政府向各媒體進行發布訊息。3.由保健衛生所通知案例場與移動管制區域內的農場，與案例場所在鄉鎮區域的行政組織協調，選定消毒站設置並進行報告。在動物衛生研究所通知縣級畜產課病例確診時：1.由畜產課進行必要單位的通報，在主要幹線道路進行消毒站的設置，公告移動限制的設立。2.保健衛生所通報案例場鄰近畜牧生產者，依防疫指針對案例場之患畜、疑似患畜、撲殺處分、汙染物品處分、案例場消毒的指示，並與縣級畜產課合作將境內感染途徑進行流行病學的調查。3.以案例場境內之保健衛生所設立現場對策本部，就總務廣播、病性鑑定、發生地緣、評價(撲殺前)、撲殺處分(通報後 24 小時內撲殺完畢)、燒燬掩埋(72 小時內完成)、消毒、檢診、追蹤、移動管制等業務進行分工。4.由縣級、現場對策本部和縣級健康福祉部確保現場作業從業人員的安全性。

疫病發生時在案例場及一般農場的應對:1.案例場接受縣知事所發布之撲殺處理命令書後,於 24 小時內完成撲殺,在撲殺前進行撲殺家禽的評價，於 72 小時內完成疑似家禽屍體的燒燬掩埋(時限係以平飼肉雞 5~10 萬隻，籠飼蛋雞 3～6 萬隻的飼養規模為基礎設定),汙染品(禽蛋、種蛋、排泄物、鋪料、飼料及其他可能汙染品)的焚毀或掩埋，案例場禽舍的消毒(以每週間實施 3 次以上的禽舍消毒)。移動限制的範圍與期間係與農林水產省動物衛生課協議而設定，禁止限制區域內的活禽、死禽、蛋、飼養管理器材、飼料及糞便等會傳播禽流感病原的物品移出，限制區域內的家禽屠宰場、GP 中心(分級包裝)及孵化場將暫停營運。移動限制範圍的設置在高病原性爆發時，以案例場半徑三公里為範圍，若有持續蔓延可能，則可延伸至半徑十公里或以上，若為低病原爆發，則以案例場半徑一公里為原則範圍，若有持續蔓延可能，則可延伸至半徑五公里或以上。

在完成前述防疫措施後，於移動限制區域內的農家進行環境檢查，家禽等臨床檢查，死禽之病毒分離與血清抗體檢查，以判定區域內是否完成疫病發生後應有處置，並於十日後再進行環境的清淨性檢查，再經 21 天進行是否解除移動限制的檢查,縣級畜產課在勘驗發生狀況與環境清淨性的確認狀況後，與農林水產省動物衛生課協議，宣告移動限制區域解除，原則在三個月內完成。

三、心得

本次與千葉縣家畜保健衛生所與地方第一線防疫獸醫師進行交流，深入探討日本防疫人員與養禽戶的溝通及主動通報的執行效率，由過程可知自防疫前之各狀況預擬及運作機制相當縝密，飼養戶與防疫人員互動良好，值得臺灣借鏡，由基層建立的穩定回報機制，也正是其得以迅速控制疫情的最大助力。

日本飼養戶須每週填報產蛋率、死亡率，表格可用政府提供者，也可使用自己的表格，因此地方防疫單位從產蛋數及死亡數很容易從提供的數據了解轄區內家禽健康狀況，這也是能掌握快速主動通報的關鍵。掌握速效通常就能降低傳播，而日本的百姓通常也是很配合的，這值得我們參考。

就診斷技術及速度上，日本同意除 PCR 下放給地方防疫單位外，連接種 SPF 蛋並採尿囊腔液做 HA 試驗也同意地方防疫單位執行。這點雖可提高檢驗速度，但以我國狀況尚有商榷餘地。

當發生重大疫情時，千葉縣可動員的公務員超過 1000 名，其中農業局的員額約600名優先動員，縣政府有權動員協助防疫，在接受既定基本訓練，確實於防疫過程中成為即時戰力。

四、建議

我國防疫措施中以可疑病例、採樣及監測候鳥排遺監測為主，而日方所採取的生產狀況監測是更為積極的預防措施，若能施行於我國或可改善飼養端隱匿病情狀況，且藉由農戶生產狀況的關切，更能增進地方防治單位與農戶的緊密聯繫，提升對疫情發生可能的掌握。相較於日本，我國在鴨隻飼養密集程度相當高，鴨隻於疫情爆發期間，受其保毒特性，容易在復養監測過程中引起反覆感染，我國自近年疫情爆發影響，逐步推動非開放式禽舍飼養模式，期能提升生產環境的生物安全性，若可投入生產狀況的監控，有望於疫情初期即能迅速掌握傳播速度。

地方防疫機關在採集樣本後，送至家禽保健中心四區檢驗室作 PCR 流程近似於日本在保健衛生所的檢測作為，然而我國可容許檢測量僅少數實驗室分攤，若遇疫情大量爆發時，必要檢測器具與檢測耗材需有一定安全庫存用量，我國主管機關及地方政府應適時評估各畜牧疾病因應耗材的庫存準備以備不時之需。

在我國公務機關組織員額固定下，難以如同日本在縣內緊急動員千名人力投入疫情應變作為，但仍可有效利用村里組織人員或產業團體人力，並在平時排定應對措施演訓課程，整備應變人力以應不時之需。

黃董事長訪日行程表

(2017 年 6 月 6 日-6 月 9 日)

地區：東京都、埼玉縣、千葉縣、茨城縣

成員：黃金城董事長、邱創進執行長、企劃組王旭昌組長、陳聰賢組員、駐日代表處經濟組戴德芳秘書

日期	時間	日程	場所
6 月 6 日 (星期二)	09:10 13:10	搭乘：日航 JL096/CI9220 臺北時間 09:10 啟程 →東京時間 13:10 抵達	臺北松山機場 東京羽田機場
	13:40 15:00	車程前往高尾山/(雨備：Tokyo Sky Tree)	
	15:00 18:00	高尾山參訪/(雨備：Tokyo Sky Tree)	東京都八王子市
	18:15 19:00	晚餐	
	20:15	住宿	品川王子飯店 東京都港區高輪 4-10-30
6 月 7 日 (星期三)	09:10	飯店出發	品川王子飯店
	09:30 12:00	高層互訪交流 交流議題： 1. 農畜產業振興機構業務簡介(ALIC 報告) 2. 日本畜產品供給以及政策的動向(ALIC 報告) 3. 臺灣畜禽產品出口及品質管理策略(NAIF 報告) 4. 其他	農畜產業振興機構(ALIC) 東京都港区麻布台 2-2-1 麻布台ビル
	12:00 12:40	午餐	農畜產業振興機構
	12:40 14:00	前往農研機構	
	14:00 16:00	農研機構動物衛生研究部門訪問(NARO) 1.瞭解禽流感病毒檢測技術 2.瞭解生物實驗室業務內容	農研機構動物衛生研究部門 茨城県つくば市観音台 3-1-5
	18:30 21:00	晚餐(迎賓宴，ALIC 主辦)	北大路虎ノ門茶寮 東京都港区虎ノ門 3-17-1 TOKYU REIT 虎ノ門ビル 1F
	21:00	住宿	品川王子飯店
6 月 8 日 (星期四)	09:40	飯店出發	
	10:00 12:00	農林水產省消費安全局動物衛生課訪問(MAFF) 1.日本禽流感疫情處置相關措施 2.防疫政策交流	農畜產業振興機構
		午餐	農畜產業振興機構

	13:00 14:00	前往農林水產消費安全技術中心	
	14:00 17:00	農林水產消費安全技術中心訪問(FAMIC) 1.該中心業務目的與沿革 2.該中心現有執行業務 3.該中心認驗證制度、檢驗技術與作業流程,於日本國內食品安全及 JAS 制度的關聯	農林水產消費安全技術中心本部 埼玉県埼玉市中央区新都心 2-1 埼玉新都心合同庁舎検査棟
	19:00 20:30	晚餐(回禮宴，本會主辦)	赤坂飯店 東京都港区赤坂 3-10-1 対翠館ビル 3.4F
	21:00	住宿	品川王子飯店
6 月 9 日 (星期五)	08:40	飯店出發	
	10:00 12:00	千葉県中央家畜保健衛生所訪問 1.地方防疫機關(家畜防疫員)主要業務 2.瞭解疫情處置措施	千葉県中央家畜保健衛生所 千葉県千葉市花見川区三角町 656
	12:50 15:20	午餐	東京 Sky Tree Town
	18:15 20:55	搭乘：日航 JL099/CI9223 東京時間 18:15 啟程 →臺北時間 20:55 抵達	東京羽田機場 臺北松山機場

參與人員一覽表

一、本會及代表處成員

中央畜產會：黃金城董事長、邱創進執行長、企劃組王旭昌組長、陳聰賢組員

臺北駐日經濟文化代表處：戴德芳秘書、王清要秘書

隨行翻譯：劉艾茹

二、日方人員：

1. 6月6日下午 高尾山健行/Tokyo Sky Tree 參觀(雨備)
   - 小林　博行　　総括理事(Mr. Kobayashi)
   - 木下　雅由　　調查情報部審查役(Mr. Kinoshita)
   - 木田　秀一郎　調查情報部員(Mr. Kida)
2. 6月7日上午 於農畜產業振興機構(交流會議)
   - 宮坂　亘　　理事長(Mr. Miyasaka)
   - 近藤　康子　　副理事長(Ms. Kondo)
   - 小林　博行　　総括理事(Mr. Kobayashi)
   - 瀨島　浩子　　調查情報部長(Ms. Sejima)
   - 木下　雅由　　調查情報部審查役(Mr. Kinoshita)
   - 露木　麻衣　　調查情報部調查役(Ms. Tsuyuki)
   - 木田　秀一郎　調查情報部員(Mr. Kida)
   - 青沼　悠平　　調查情報部員(Mr. Aonuma)
3. 6月7日下午 拜訪農研機構動物衛生研究部門(NARO)
   - 西藤　岳彥　　越境性感染症研究領域長(Mr. Saitou)
   - 横山　隆　　企画管理部長
   - 横山　理惠子　企画管理部企画連絡室　行政連携調整役(Ms. Yokoyama)
4. 6月7日晚上 農畜產業振興機構迎賓宴
   - 宮坂　亘　　理事長(Mr. Miyasaka)
   - 近藤　康子　　副理事長(Ms. Kondo)
   - 小林　博行　　総括理事(Mr. Kobayashi)
   - 瀨島　浩子　　調查情報部長(Ms. Sejima)
   - 木下　雅由　　調查情報部審查役(Mr. Kinoshita)
   - 木田　秀一郎　調查情報部員(Mr. Kida)
   - 戴德芳秘書
   - 王清要秘書
5. 6月8日上午 拜訪農林水產省消費安全局動物衛生課(MAFF)
   - 熊谷　法夫　　動物衛生課　課長(Mr. Kumagai)
   - 栗栖　輝光　　課長補佐(Mr. Kurisu)
   - 菊池　栄作　　課長補佐(Mr. Kikuchi)
   - 谷　　義人　　課長輔佐(Mr. Tani)
6. 6月8日下午 拜訪農林水產消費安全技術センター本部(FAMIC)
   - 木村　眞人　　理事長（挨拶のみ）(Mr. Kimura)
   - 朝倉　健司　　理事（総合調整・食品等検查担当）(挨拶のみ)(Mr. Asakura)
   - 山本　実　　理事（評価・肥飼料検查担当）(Mr. Yamamoto)

鈴木　広明　　企画調整部　国際課　課長(Mr. Suzuki)
柳沢　幸夫　　企画調整部　広報室　室長(Mr. Yanagisawa)
石川　聖文　　規格検査部　規格検査課　主任調査官(Mr. Ishikawa)
櫻庭　隆司　　表示監視部　表示指導課　課長(Mr. Sakuraba)
原田　伸一　　表示監視部　表示指導課　主任調査官(Mr. Harada)
高橋　賢　　肥飼料安全検査部　肥料管理課　課長(Mr. Takahashi)
石橋　隆幸　　肥飼料安全検査部　飼料管理課　課長(Mr. Ishibashi)
松﨑　学　　肥飼料安全検査部　飼料鑑定第一課　課長(Mr. Matsusaki)
橋本　亮　　肥飼料安全検査部　飼料鑑定第二課　課長(Mr. Hashimoto)
藤河　淳子　　企画調整部　国際課　主任調査官（事務担当）(Ms. Fujikawa)

7. 6月8日晚上 本會回禮宴
熊谷　法夫　　農林水産省　消費・安全局動物衛生課(Mr. Kumagai)
栗栖　輝光　　課長補佐(Mr. Kurisu)
宮坂　亘　　理事長(Mr. Miyasaka)
小林　博行　　総括理事(Mr. Kobayashi)
瀬島　浩子　　調査情報部長(Ms. Sejima)
木下　雅由　　調査情報部審査役(Mr. Kinoshita)
木田　秀一郎　調査情報部員(Mr. Kida)

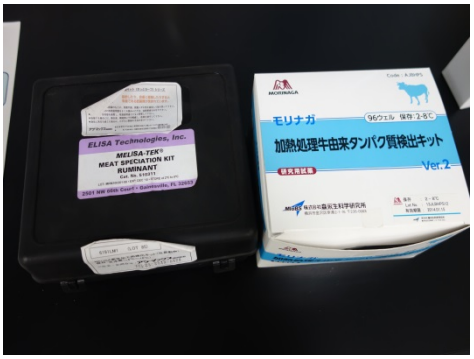
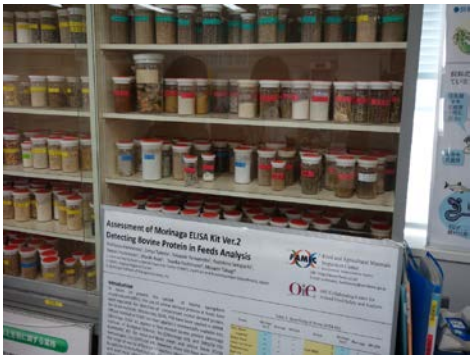
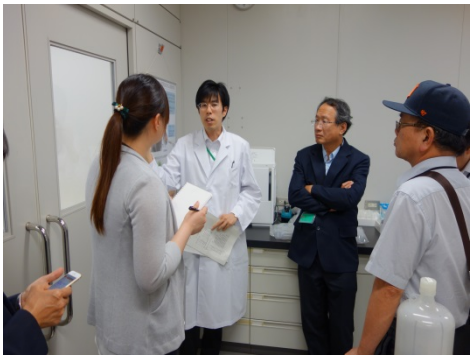
8. 6月9號上午 千葉県中央家畜保健衛生所(佐倉分所)
高橋　岩雄　　所長(Mr. Takahashi)
原　　普　　次長（佐倉分所）(Mr. Hara)
松本　敦子　　細菌ウイルス(virus)課長(Ms. Matsumoto)
大坪　岳彦　　上席専門員(Mr. Ootsubo)
木下　智秀　　病理生化学課長(Mr. Kinoshita)

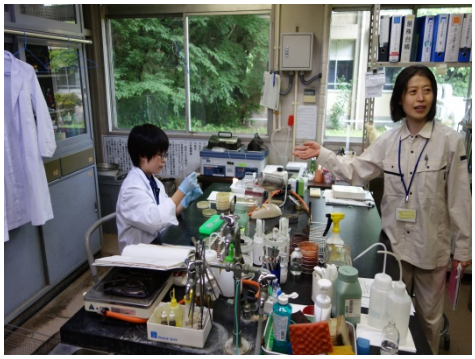
	
參訪東京食肉市場周圍	東京食肉市場外觀
	
與振興機構交流	宮坂理事長致詞
	
黃董事長致詞	與振興機構交換紀念品
	
與振興機構交換紀念品	交流人員合影

	
小林總括理事說明日本政策動向	進行本年度交流活動
	
進行本年度交流活動	王副執行長說明我國品質策略
	
雙方進行熱烈討論	雙方進行熱烈討論
	
拜訪動物衛生研究部門	與動物衛生研究部門交流

 聽取研究部門業務內容	 與研究部門合影
 傳統市場內專買玉子燒的店面	 廚師現場料理玉子燒
 傳統市場中具冷藏設備的肉販	 與農林水產省動物衛生課交流

	
交流禽流感處置措施	交流禽流感相關政策
	
與農林水產省動物衛生課交流	拜訪農林水產消費安全技術中心
	
拜訪農林水產消費安全技術中心	與農林水產消費安全技術中心交流
	
介紹農林水產消費安全技術中心業務	參訪技術中心

	
BSE 相關檢測試劑(kit)	參訪放射性檢測實驗室
	
於市面採集之飼料原料樣本	解說樣本檢測流程
	
參訪同位素檢測實驗室	參訪有害物質檢測實驗室
	
與中央家畜保健衛生所交流	與中央家畜保健衛生所交流

	
參訪衛生所實驗設備	參訪衛生所實驗設備
	
參訪衛生所實驗設備	參訪衛生所實驗設備
	
參訪衛生所解剖室	衛生所之焚燒設備
	
解說大型家畜移入檢驗流程	解說大型家畜移入檢驗流程

資料 4

alic

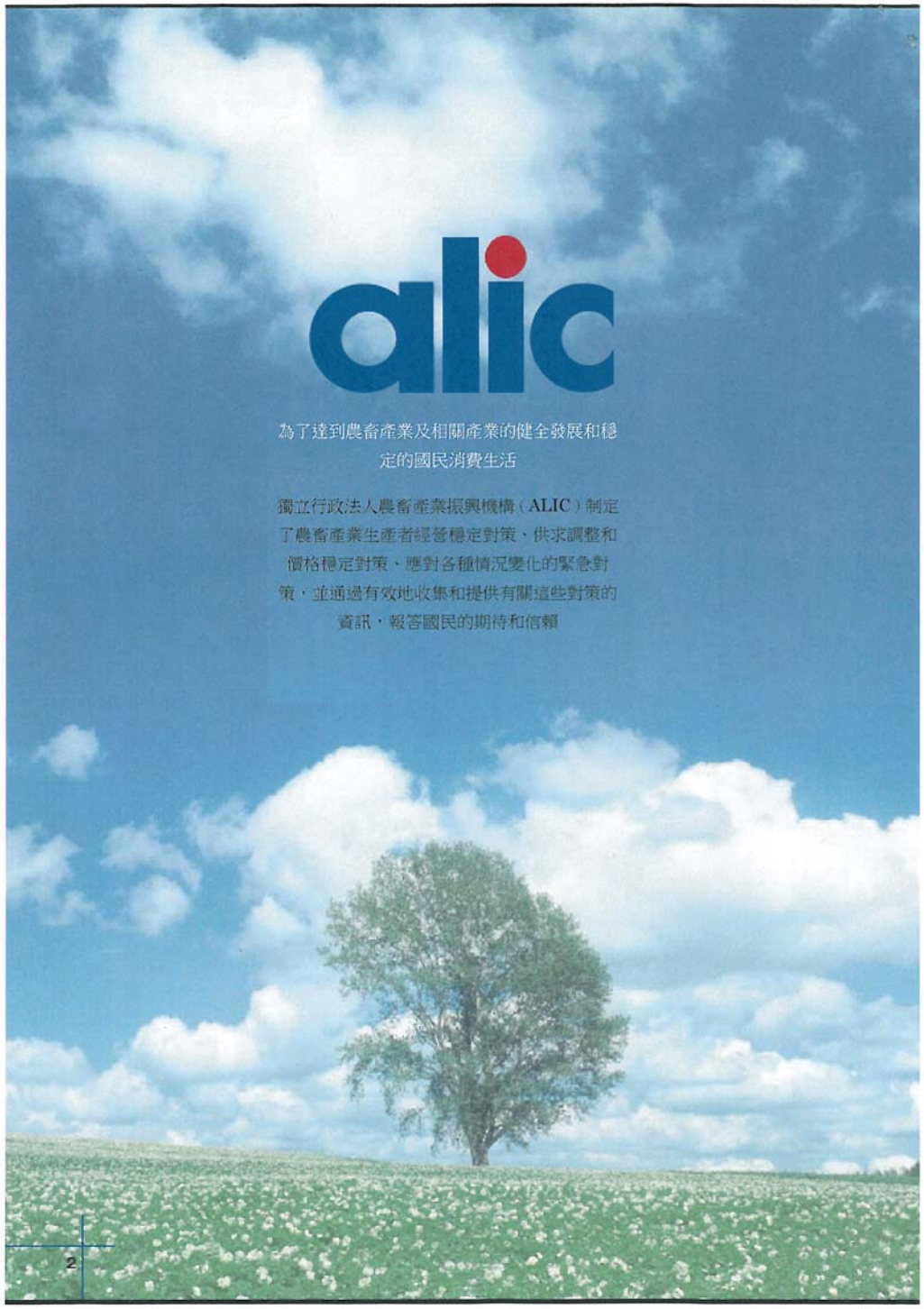
為了農畜產業及相關產業的健全發展和穩定的國民消費生活

http://www.alic.go.jp/

alic

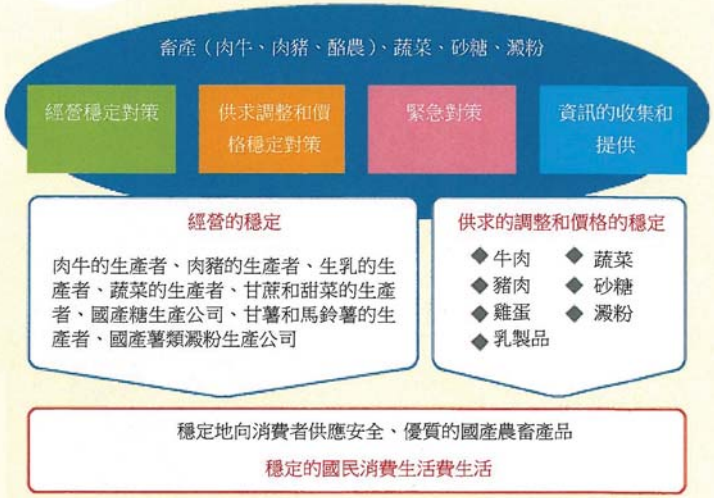
為了達到農畜產業及相關產業的健全發展和穩定的國民消費生活

獨立行政法人農畜產業振興機構（ALIC）制定了農畜產業生產者緩衝穩定對策、供求調整和價格穩定對策，應對各種情況變化的緊急對策，並通過有效地收集和提供有關這些對策的資訊，報答國民的期待和信賴



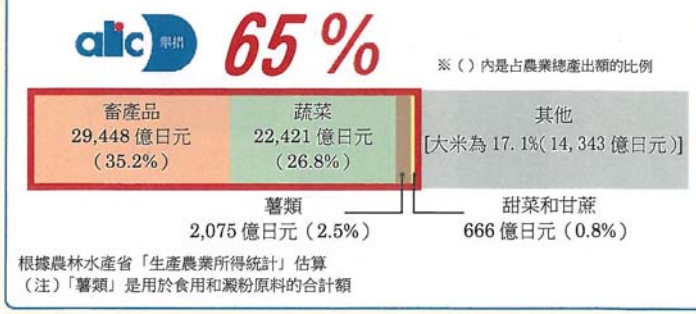
alic 舉措

ALIC 為了謀求穩定地供應國產農畜產品，以生產者的經營穩定對策為中心，制定供求調整和價格穩定對策、緊急對策，並從事資訊收集和提供的業務。



ALIC 的業務對象是畜產品、蔬菜、砂糖及其原料作物、薯類澱粉及其原料作物，種類非常多，約占日本農業總產出額的 65%。

○ 農業總產出額（2014 年度）



根據農林水產省「生產農業所得統計」估算
（注）「薯類」是用於食用和澱粉原料的合計額

alic 舉措 1. 經營穩定對策

從事各種制度事業和輔助事業，謀求農畜產品生產者的經營穩定。

為了穩定地向消費者供應安全、優質的國產農畜產品，需要謀求生產者的經營穩定。

alic 肉用小牛的生產者

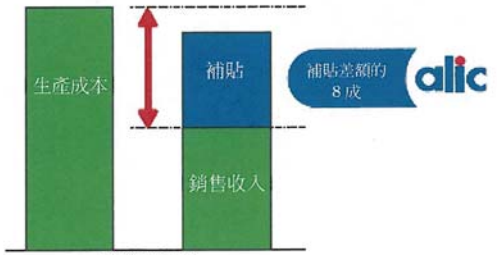
肉用小牛生產者補貼制度

為了謀求肉用小牛生產者的經營穩定，當小牛的銷售價格低於生產成本（保證基準價格）時，向肉用小牛生產者發放補貼。

alic 肉牛生產者

肉用牛育肥經營穩定特別對策事業

為了謀求國產牛肉供應者，即肉牛生產者的經營穩定，當因飼料價格上漲和牛胴體肉價格下跌等原因，使銷售收入低於飼料等生產成本時，向肉牛生產者發放補貼。



收益惡化時

肉豬生產者

養豬經營穩定對策事業

為了謀求國產豬肉供應者，即肉豬生產者的經營穩定，當因飼料價格上漲和豬胴體肉價格下跌等原因，使銷售收入低於飼料等生產成本時，向肉豬生產者發放補貼。

生乳生產者

加工原料乳生產者補貼制度

為了謀求國產牛奶乳製品供應者，即生乳生產者（加工原料乳生產者）的經營穩定和牛奶乳製品的穩定供應，由於奶油和脫脂奶粉的價格比鮮牛奶便宜，所以向銷售乳製品原料生乳的加工原料乳生產者發放補貼。

蔬菜生產者

① 指定蔬菜和特定蔬菜

為了謀求蔬菜生產者的經營穩定和國產蔬菜的穩定供應，當消費量大的蔬菜（指定蔬菜及特定蔬菜）的價格低於一定的價格（保證基準額）時，向蔬菜生產者發放補助金。

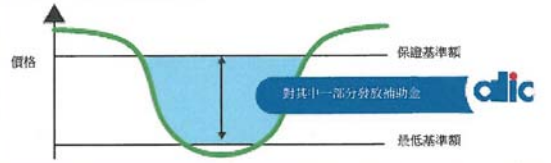
指定蔬菜（14 個品種）

捲心菜	蘿蔔	茄子	大白菜	菠菜
黃瓜	洋蔥	胡蘿蔔	馬鈴薯	生菜
芋頭	番茄	蔥	青椒	

特定蔬菜（35 個品種）

芦笋	豌豆	芦笋	大蒜頭	蓮藕
草莓	牛蒡	草莓	蜂斗菜	秋葵
毛豆荚	小松菜	毛豆荚	綠花椰菜	甜尖椒
蕪菁	四季豆	蕪菁	雪里蕻	苦瓜
南瓜	荷蘭豆	南瓜	鴨儿芹	茗荷
花椰菜	茼蒿	花椰菜	香瓜	薤白
甘薯	蓮	甘薯	山药	冬葱

● 蔬菜價格穩定制度的機制



② 合同蔬菜

為了降低與餐館和加工業者及小商店等簽訂供應合同的蔬菜生產者的風險，推動穩定的供應合同，當指定蔬菜及特定蔬菜的價格低於一定的價格（保證基準額）時，向蔬菜生產者發放補助金。

蔬菜中間商

為了當蔬菜欠收時降低與餐館和加工業者及小商店等簽訂供應合同的蔬菜中間商的風險，推動與蔬菜生產者的穩定交易，當中間商對為了確保合同數量而簽約的合同品種進行市場調整時，向中間商發放補助金。

甘蔗生產者和砂糖生產商

① 發放甜味資源作物補助金

為了謀求甘蔗生產者的經營穩定，對甘蔗生產者的必要經費中，支付給生產者的費用不足以支付砂糖原料費的部分，發放補助金。

注：對砂糖原料的甜菜生產者，另由國家發放補助金。

② 發放國產糖補助金

為了謀求以國產甜菜或甘蔗為原料生產砂糖的廠商的經營穩定，對砂糖原料費和生產經費中，砂糖的銷售價格不足以支付的部分，發放補助金。

甘蔗生產者和砂糖生產商

① 發放澱粉原料用薯類補助金

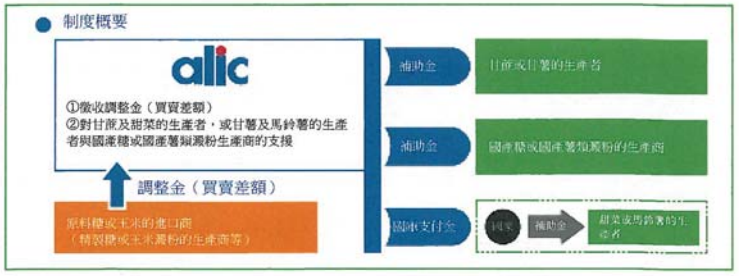
為了謀求澱粉原料的甘薯生產者的經營穩定，對甘薯生產的必要經費中，支付給生產者的費用不足以支付澱粉原料費的部分，發放補助金。

注：對澱粉原料的馬鈴薯生產者，另由國家發放補助金。

② 發放國產薯類澱粉補助金

為了謀求以國產甘薯及馬鈴薯為原料生產澱粉的廠商（國產薯類澱粉生產商）的經營穩定，對澱粉原料費和生產經費中，澱粉的銷售價格不足以支付的部分，發放補助金。

● 制度概要



2. 供求調整和價格穩定對策

謀求牛肉、豬肉、雞蛋、乳製品、蔬菜、砂糖、澱粉的供求調整和價格穩定。

為了謀求國民消費生活的穩定，實施農畜產品的供求調整和價格穩定對策（安全網）。

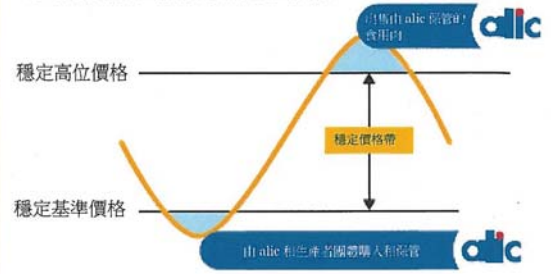
牛肉、豬肉及雞蛋

①當牛肉、豬肉及雞蛋的價格低於一定的價格（穩定基準價格），在比較短的時間內有可能恢復時，ALIC 對生產者團體購入的牛肉、豬肉及雞蛋的保管經費進行補助。

②當牛肉及豬肉的價格低於一定的價格（穩定基準價格），並且這種情況要持續相當一段時間時，ALIC 將直接從市場購入牛肉及豬肉並進行保管。

③另一方面，當牛肉及豬肉的價格高於一定的價格（穩定高位價格）時，將出售保管的牛肉及豬肉。

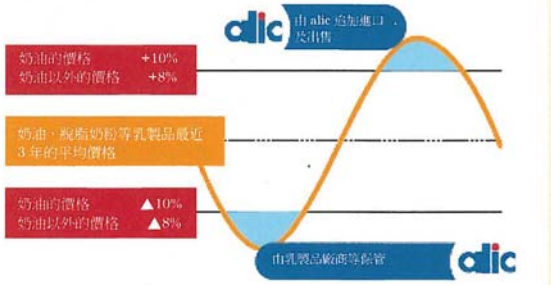
● 牛肉及豬肉的價格穩定制度的機制



乳製品

①當奶油、脫脂奶粉等的國內價格顯著上漲，或有可能上漲時，除了通過國際約定數量（現行交易）進行進口外，還追加進口這些乳製品並出售。
②②另一方面，當奶油、脫脂奶粉等的國內價格顯著下跌，或有可能下跌時，將對乳製品廠商等生產的乳製品的保管經費進行補助。

● 乳製品價格穩定制度的機制



乳製品的進口和出售

①ALIC 根據 WTO 國際協定，作為國家貿易機構，每年度通過現行交易進口奶油、脫脂奶粉等指定乳製品並出售。
②②另外，由民間進口指定乳製品等時，為了謀求調整內外價格差，ALIC 通過從進口商購入後直接轉銷的方式，徵收加價（相當於關稅的部分）。
徵收的加價將被用於乳製品原料，即生乳的生產者（加工原料乳生產者）的經營穩定對策。

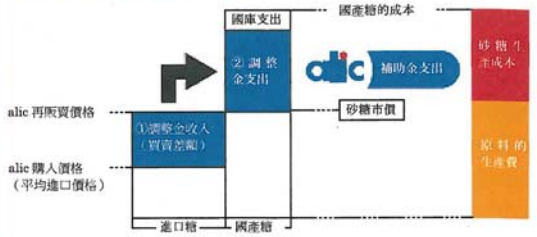
蔬菜

①為了應對蔬菜的價格變動，除了通過運營「蔬菜供求協議會」，謀求蔬菜的生產、流通和消費的各相關方之間大量資訊的共享之外，還通過主頁等向國民提供供求資訊。
②當蔬菜價格顯著下跌時，向有效利用和進行市場隔離的蔬菜生產者發放補助金。
③當蔬菜價格顯著上漲時，對生產者團體提前出售以及出售通常不出售的蔬菜（比如彎黃瓜等格外品蔬菜），補助必要經費的一部分。

進口糖等的購入和再販賣

①為了謀求調整進口砂糖類（進口糖）與國內生產的砂糖的價格差，ALIC 通過從進口商購入進口糖等後立即再販賣的方式徵收調整金（買賣差額）。
②徵收到的調整金將被用於甘蔗及甜菜的生產者和國產糖生產商的經營穩定對策。

● 砂糖價格調整制度的機制

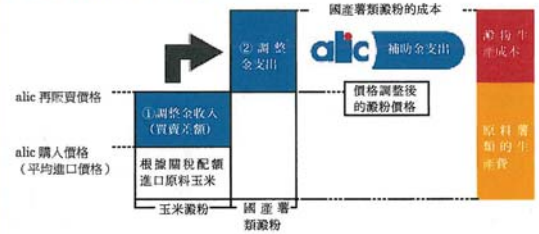


進口澱粉及玉米澱粉用玉米的購入和再販賣

①為了謀求調整進口澱粉與國內生產的薯類澱粉的價格差，ALIC 通過從進口商購入進口澱粉及玉米澱粉用玉米後立即再販賣的方式徵收調整金（買賣差額）。

②②徵收到的調整金將被用於澱粉原料用薯類（甘薯及馬鈴薯）生產者和國產薯類澱粉生產商的經營穩定對策。

● 澱粉價格調整制度的機制



3. 緊急對策

應對口蹄疫、高病原性禽流感等家畜疾病的發生和經濟形勢等變化的緊急對策。

為了向消費者穩定地供應安全優質的國產農畜產品，實施各種緊急對策。

① 為了應對口蹄疫、高病原性禽流感等對畜牧業有重大且嚴重影響的家畜疾病等的發生、對發生地區的生產者進行緊急支援等對策。

2010 年 4 月、在宮崎縣發生的口蹄疫、以及日本各地發生的高病原性禽流感時、對受影響的農戶實施了經營重建支援。
2015,2016 年的颱風受害、對 2016 年的熊本地震的受害、對受災農家、實施損壞的設施·機器的修復費和為了家畜引進的支援。

②應對飼料價格的上漲，牛肉、豬肉價格的低迷等圍繞畜牧業形勢的變化，對畜牧生產者及畜牧相關者實施緊急的降低影響等對策。

應對 2012 年度的配合飼料價格上漲，進行融資改善畜牧經營，並且為了提高畜牧經營的生產性和飼料自給率等，實施支援引進必要的機械設備。

③為了謀求滿足消費者需求的商品的穩定供應和蔬菜生產者的經營穩定，對蔬菜生產者實施緊急對策。

應對 2008 年度的燃油等的上漲、對實施溫室節能化的生產者進行支援。

4. 資訊的收集和提供

舉措 alic

收集和提供有助於生產者經營穩定和判斷供求動向的資訊。

為了謀求農畜產品生產者的經營穩定，健全發展相關產業和價格的穩定，在生產者、加工和流通相關者、消費者等準確地把握國內外農畜產品的供求動向的同時，及時向他們提供農業政策、技術革新等有助於經營穩定對策的資訊是非常重要的。
為此，ALIC 重點收集有助於生產者經營穩定和判斷農畜產品供求動向的資訊，分析由員工寫的現場調查結果、獨立完成的統計和資料等的資訊，廣泛地提供給生產者、相關業界、行政機構、大學和試驗研究機構及消費者等。

alic 主要的資訊提供方式

- **資訊雜誌（月刊）和宣傳雜誌（隔月刊）**

「畜產資訊」、「蔬菜資訊」、「砂糖類和澱粉資訊」刊登了供求預測、供求動向的解說及各種統計資料，員工等報導的國外動向，國內優良事例的調查報告等。另外，為了讓外界更多地瞭解 ALIC 的工作，對 ALIC 感興趣，還發行了宣傳雜誌「alic」。

- **主頁**

除了月刊的內容，還提供了廣泛包羅各項業務的即時資訊和國內外的生產、供求、價格等的資料庫，以及以一般消費者為對象的通俗易懂的資訊等。

- **VEGETAN**

這是 ALIC 運營的提供有關蔬菜綜合資訊的系統。這個系統統一收集氣象、市場情況、進出口動向、消費動向等統計資料，並提供資訊。

alic 參考資料

畜產

1. 畜產品（牛肉、豬肉、雞肉）的消費量（全國人均）　（kg/人）

	2010 年度	2011 年度	2012 年度	2013 年度	2014 年度
牛肉	5.9	6.0	5.9	6.0	5.9
豬肉	11.7	11.9	11.8	11.8	11.9
雞肉	11.3	11.4	12.0	12.0	12.2

注：2009 年度後的雞肉消費量以日曆年度（1～12 月）計算

2. 牛奶・奶制品的消費量（全國人均）　（kg/人（以鮮牛奶計算））

	2010 年度	2011 年度	2012 年度	2013 年度	2014 年度
牛奶・奶制品	86.4	88.6	89.5	89.0	89.6

農林水產省「食品需求表」

蔬菜

1. 各都道府縣蔬菜生產量排名（2013 年）

	都道府縣	生產金額（億日元）	主要品種
第 1 名	北海道	2,116	洋蔥、番茄、胡蘿蔔
第 2 名	茨城	1,707	生菜，哈密瓜蔥、番茄
第 3 名	千葉	1,611	蔥、番茄、菠菜
第 4 名	熊本	1,191	番茄、草莓、西瓜
第 5 名	愛知	1,011	高麗菜、番茄、草莓

農林水產省「生產農業所得統計」

2. 新鮮蔬菜購買量及金額（全國人均）　（kg、日元/人）

	2011 年	2012 年	2013 年	2014 年	2015 年
購買量	56.8	56.9	58.0	58.5	58.0
金額	21,024	21,194	21,875	22,556	24,024

總務省「家計調查結果表（不包括農林漁業家庭）」

砂糖

1. 砂糖的需求　（千噸）

砂糖年度	需求	供應			
	總需求量	國際生產量	甜菜糖	甘蔗糖	進口量
2011	2,039	674	564	104	1,375
2012	2,026	691	561	122	1,338
2013	2,006	687	551	129	1,284
2014	1,971	737	607	122	1,220
2015	1,983	813	676	129	1,235

農林水產省資料

2. 各國人均砂糖消費量　（kg/人、年）

國別	2015/2016 年度（估算值）
澳大利亞	60.0
巴西	59.4
泰國	51.2
歐盟	37.9
美國	34.1
日本	16.1
中國	12.8

農畜產業振興機構委託調查公司　Agra CEAS Consulting 的估算

澱粉

1.澱粉的需求 （千噸）

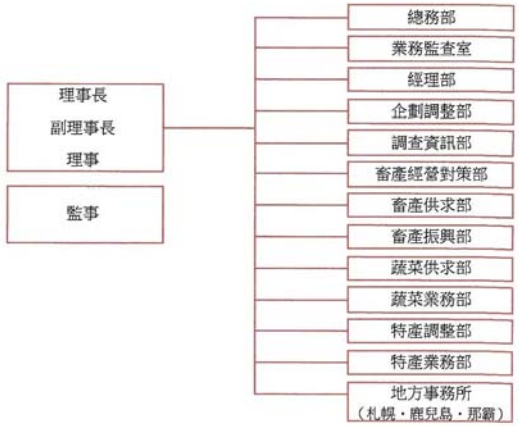
澱粉年度	總需求量	高果糖糖・澱粉糖漿等	化工澱粉	纖維・造紙・紙板	啤酒	水產製品	其他
2010	2,804	1,857	329	204	92	25	297
2011	2,683	1,796	319	172	98	16	283
2012	2,623	1,803	296	161	100	16	248
2013	2,637	1,792	312	179	99	18	237
2014	2,568	1,721	324	182	98	17	226

2.澱粉供應 （千噸）

澱粉年度	總供應量	國產薯類澱粉		玉米澱粉	進口澱粉	小麥澱粉
		甘薯	馬鈴薯			
2010	2,804	51	179	2,412	142	20
2011	2,683	45	168	2,307	145	19
2012	2,623	36	169	2,258	142	18
2013	2,637	39	175	2,266	140	17
2014	2,568	39	186	2,190	136	18

農林水產省資料

alic 組織 組織概要



Agriculture & Livestock Industries Corporation
(ALIC)

● 總部所在地
〒106-8635
東京都港區麻布台 2 丁目 2 番 1 號麻布台大廈

○ 總機（綜合窗口）宣傳消費者科
TEL 03-3583-8196 FAX 03-3582-3397

さらに詳しくALICを知るには、ALICホームページURL
http://www.alic.go.jp/

○各部・室的電話號碼

秘書室	TEL 03-3583-8737
總務部	TEL 03-3583-8469
業務監查室	TEL 03-3583-8237
經理部	TEL 03-3583-9464
企劃調整部	TEL 03-3583-8603
調查資訊部	TEL 03-3583-8678
畜產經營對策部	TEL 03-3583-8490
畜產供求部	TEL 03-3583-8616
畜產振興部	TEL 03-3583-4334
蔬菜供求部	TEL 03-3583-9449
蔬菜業務部	TEL 03-3583-8481
特產調整部	TEL 03-3583-8959
特產業務部	TEL 03-3583-8483

●地方事務所

札幌事務所
〒060-0003
札幌市中央區北 3 條西 7-1
酪農中心內
TEL 011-221-0786
FAX 011-261-0580

鹿兒島事務所
〒892-0847
鹿兒島市西千石町 17-3
太陽生命鹿兒島第二大廈 7 樓
TEL 099-226-4731
FAX 099-226-4751

那霸事務所
〒900-0033
那霸市久米 2-4-14
JB・NAHA 大廈 3 樓
TEL 098-866-1033
FAX 098-860-5775

2017年1月

日本的畜產品供給以及政策的動向

２０１７年６月
獨立行政法人農畜產業振興機構

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構
（エーリック、農畜産機構）

資料5

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

１．供給動向和政策實施

1
日本

豬隻飼養的動向

區分／ 年	2007	2008	2009	2011	2012	2013	2014	2016
飼養戶數(千戶)	7.6 (▲3.2)	7.2 (▲4.2)	6.9 (▲4.7)	6.0 (▲12.8)	5.8 (▲2.8)	5.6 (▲4.6)	5.3 (▲5.4)	4.8 (▲8.3)
其中飼養2千頭以上肥育豬的戶數（千戶）所佔的比例 戶數比例（%）	0.9 (14.3)	1.0 (15.5)	1.0 (16.7)	1.0 (18.4)	1.0 (19.1)	1.0 (20.6)	1.0 (21.5)	1.0 (21.8)
飼養頭數(千頭)	9,759 (1.4)	9,745 (▲0.1)	9,899 (1.6)	9,768 (▲1.3)	9,735 (▲0.3)	9,685 (▲0.5)	9,537 (▲1.5)	9,313 (▲2.3)
其中取子用的母豬（千頭）	915 (0.9)	910 (▲0.5)	937 (2.9)	902 (▲3.7)	900 (▲0.2)	900 (0.0)	885 (▲1.6)	845 (▲4.6)
其中飼養肥育豬2千頭以上者（千頭） 頭數比例（%）	5,711 (61.7)	5,788 (62.4)	6,219 (65.4)	6,492 (68.6)	6,394 (68.0)	6,583 (70.3)	6,528 (70.7)	6,309 (70.0)
每戶平均 飼養頭數(頭)	1,292.6	1,347.9	1,436.7	1,625.3	1,667.0	1738.8	1809.7	1928.2
每戶平均 取子用母豬頭數(頭)	139.5	145.6	158.0	176.5	183.7	194.7	206.4	214.4

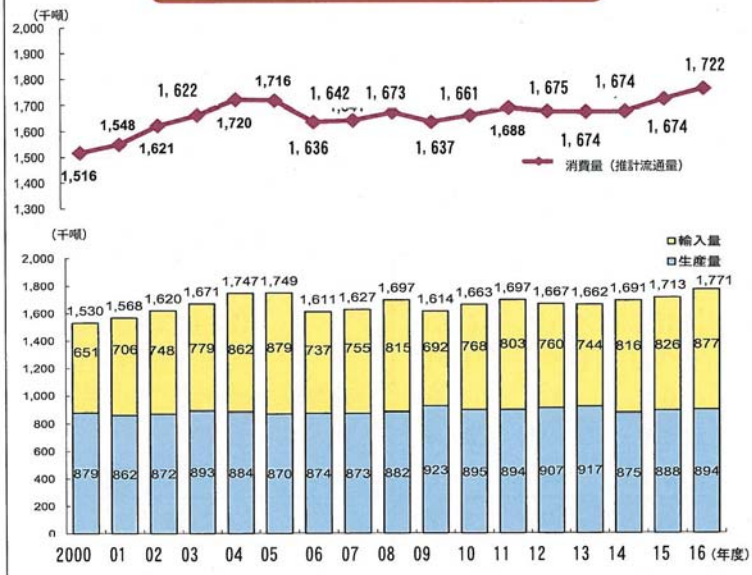
資料：農林水產省「畜產統計」（每年2月1日時點）

注：２０１０年及２０１５年因為是世界農林業調查的調查年，所以沒有可以比較的數據。另外，2011年( )內的數值，是和2009年所比較而來的數值。

2 日本

豬肉的供需動向

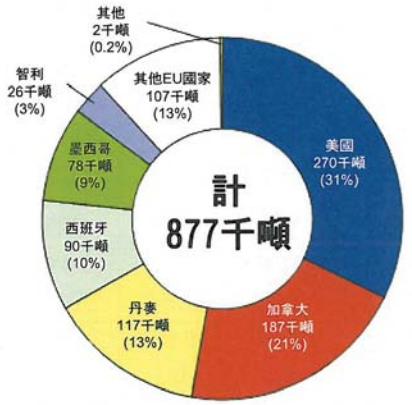
豬肉供需（以部分肉為準）之推移



資料：農林水產省「畜產物流統計」 財務省「貿易統計」（獨）農畜產業振興機構「食肉的保管狀況調查」

注：推定流通量(原文：推定出回り量)＝生產+輸入量+前年在庫量－當年度在庫量－輸入量

輸入國（以部分肉為準）2016年度

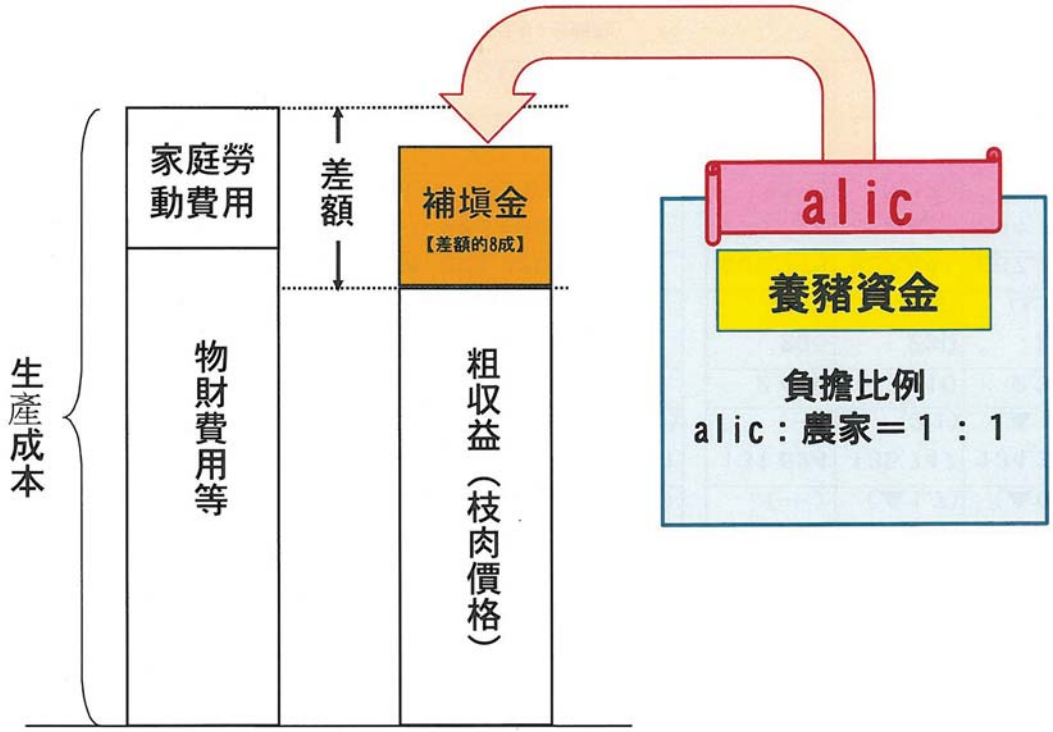


EU計
314千噸
(35%)

資料：財務省「貿易統計」

3 日本

養豬經營安定對策事業（豬Marukin）之概要



4
日本

雞（肉雞）的飼養動向

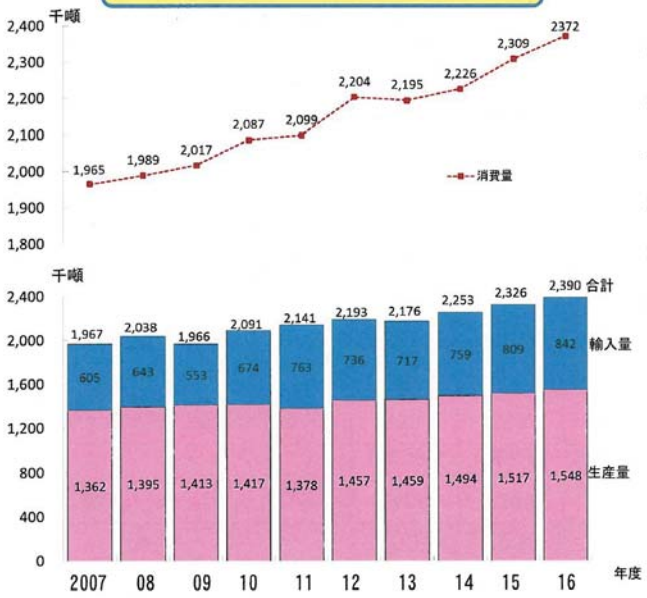
区分／年	2007	2008	2009	2013	2014	2016
飼養戶數(戶)	2,583	2,456	2,392	2,420	2,380	2,360
（對前年增減率）	（▲0.3）	（▲4.9）	（▲2.6）	（—）	（▲1.7）	（▲0.8）
飼養隻數（千隻）	105,287	102,987	107,141	131,624	135,747	134,395
（對前年增減率）	(1.5)	（▲2.2）	(4.0)	（—）	(3.1)	（▲1.0）
出貨戶數(戶)	2,991	2,925	－	2,440	2,410	2,360
其中出貨50萬隻以上者（戶）	194	203	－	225	230	266
戶數比例（%）	(6.5)	(6.9)	－	(9.2)	(9.5)	(11.3)
出貨隻數(千隻)	622,834	629,766	－	649,778	652,441	667,438
其中出貨50萬隻以上者（千隻）	217,617	225,436	－	270,778	270,971	294,138
隻數比例（%）	(34.9)	(35.8)	－	(41.7)	(41.5)	(44.1)
每戶平均飼養隻數（千隻）	40.8	41.9	44.8	54.4	57	56.9
每戶平均出貨隻數（千隻）	208.2	215.3	－	266.3	270.7	282.8

資料：農林水產省「畜產物流通統計」、「畜產統計」（每年2月1日時點）
注1：飼養戶數及隻數為每年2月1日時點之數值
2：2009年為止的數據來自畜產品流通統計、2013年之數據為畜產統計所做的調查，和2009年以前的數據無連結性
3：2013年之數值，為除去每年出貨隻數未滿3000隻之飼養者後的數據。
4：2015年因為是世界農林業調查的調查年，所以沒有可以比較的資料。

5
日本

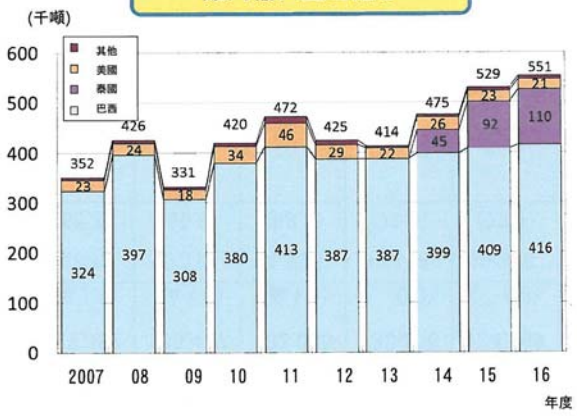
雞肉的供需動向

雞肉供需之推移(含調整品)



資料:農林水産省「食料需給表」
注1:2009年度以後是以年次計算
注2:2015年度為概算值
注3:消費量以「生產量+輸入量-輸出量-庫存之增加量」計算而得

雞肉輸入量之推移



資料:財務省「貿易統計」
注:不含調整品

紅:其他。粉紅:中國。橘:美國。
紫:泰國。淺藍:巴西。

6
日本

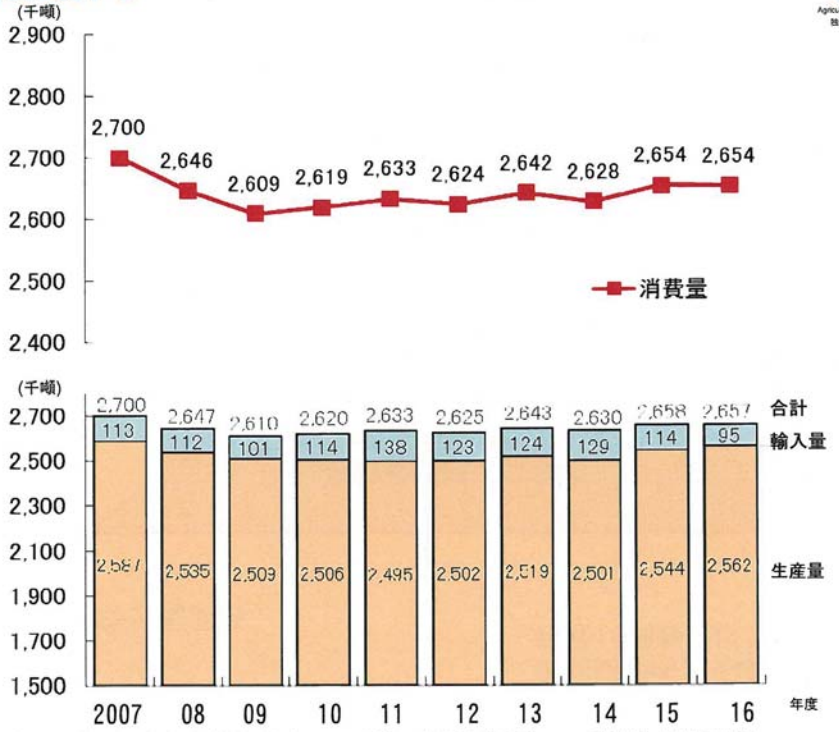
蛋雞之飼養動向

區分 ／ 年	2007	2008	2009	2011	2012	2013	2014	2016
飼養戶數(戶)	3,460	3,300	3,110	2,930	2,810	2,650	2,560	2,440
	(▲3.9)	(▲4.6)	(▲5.8)	(▲5.8)	(▲4.1)	(▲5.7)	(▲3.4)	(▲4.7)
其中母成雞10萬隻以上者(戶)	365	356	350	336	327	328	324	347
戶數比例(%)	(11.6)	(11.9)	(12.4)	(12.5)	(12.8)	(13.5)	(14.0)	(15.7)
母成雞飼養隻數(千隻)	142,765	142,523	139,910	137,352	135,477	133,085	133,506	134,569
	(4.3)	(▲0.2)	(▲1.8)	(▲1.8)	(▲1.4)	(▲1.8)	(0.3)	(0.8)
其中10萬隻以上者(千隻)	88,453	91,543	91,001	90,083	90,314	91,556	93,476	99,395
隻數比例(%)	(62.0)	(64.3)	(65.2)	(65.7)	(66.8)	(68.8)	(70.0)	(73.9)
每戶平均 母成雞飼養隻數(千隻)	41.3	43.2	45.0	46.9	48.2	50.2	52.2	55.2

資料:農林水産省「畜産統計」(每年2月1日時點)
注1:不含只飼養種雞者。
注2:此處數值不含飼養之母成雞未滿1000隻者。
注3:2010年和2015年為世界農林業調查的調查年,所以沒有可比較之資料。並且、2011年的( )內之數值為和2009年之比較。

7
日本

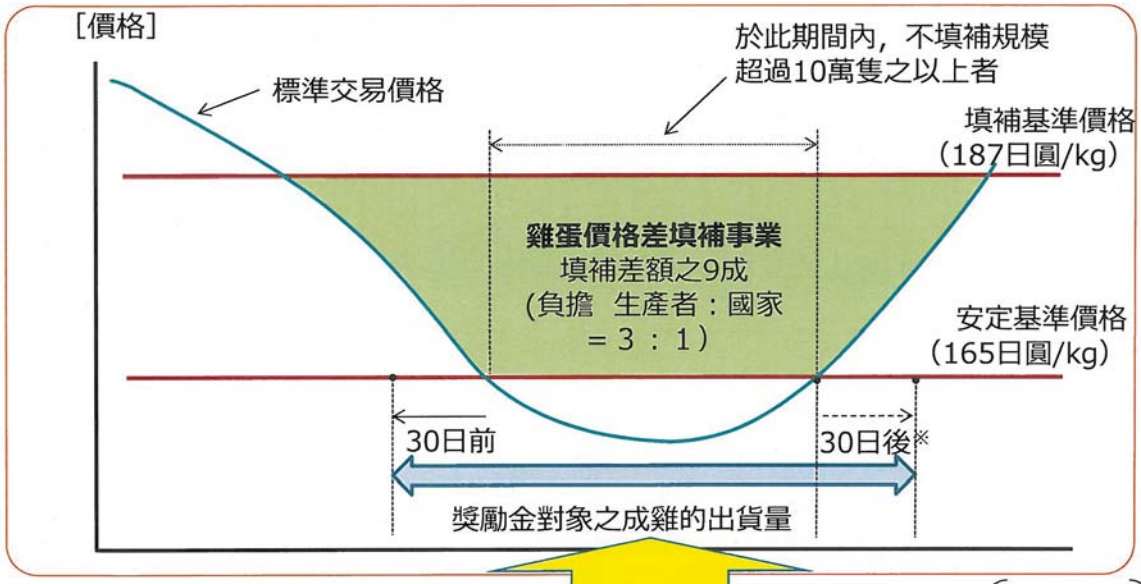
雞蛋的供給動向



資料：農林水產省「食料需給表」、「鶏卵流通統計調査」、財務省「貿易統計」
注１：２０１５、２０１６年度為概算值。
注２：以「生産量＋輸入量－輸出量」來推計消費量。

8
日本

有關於雞蛋生產者經營安定對策



成雞更新·空雞舍延長事業
對於為了進行更新而出貨成雞，並於其後將雞舍維持騰空狀態60日以上者，給付獎勵金 (210円/隻以內)。
(負擔 生產者：國家＝１：３)

※價格高於安定基準價格之前，已被肉雞處理廠預定者。

9
日本

肉用牛的飼養動向

区分／年		2007	2008	2009	2010	2011	2012	2013	2014	2015	2016
肉牛	戶數（千戶）	82.3	80.4	77.3	74.4	69.6	65.2	61.3	57.5	54.4	51.9
	對前年增減率	▲3.9)	▲2.3)	▲3.9)	▲3.8)	▲6.5)	▲6.3)	▲6.0)	▲6.2)	▲5.4)	▲4.6)
	頭數（千頭）	2,806	2,890	2,923	2,892	2,763	2,723	2,642	2,567	2,489	2,479
	對前年增減率	1.9)	3.0)	1.1)	▲1.1)	▲4.5)	▲1.4)	▲3.0)	▲2.8)	▲3.0)	▲0.4)
	每戶平均(頭)	34.1	35.9	37.8	38.9	39.7	41.8	43.1	44.6	45.8	47.8
繁殖母牛	戶數（千戶）	71.1	69.7	66.6	63.9	59.1	56.1	53.0	50.0	47.2	44.3
	頭數（千頭）	636	667	682	684	668	642	618	595	580	589
	每戶平均(頭)	8.9	9.6	10.2	10.7	11.3	11.4	11.7	11.9	12.3	13.3
肥育牛	戶數（千戶）	16.7	16.5	16.8	15.9	15.2	14.3	13.5	13.1	11.6	11.7
	頭數（千頭）	1,801	1,837	1,842	1,812	1,718	1,702	1,663	1,623	1,568	1,557
	每戶平均(頭)	107.9	111.3	109.6	114.0	113.0	119.0	123.2	123.9	135.2	133.1

資料：農林水產省「畜產統計」（每年２月１日時點）

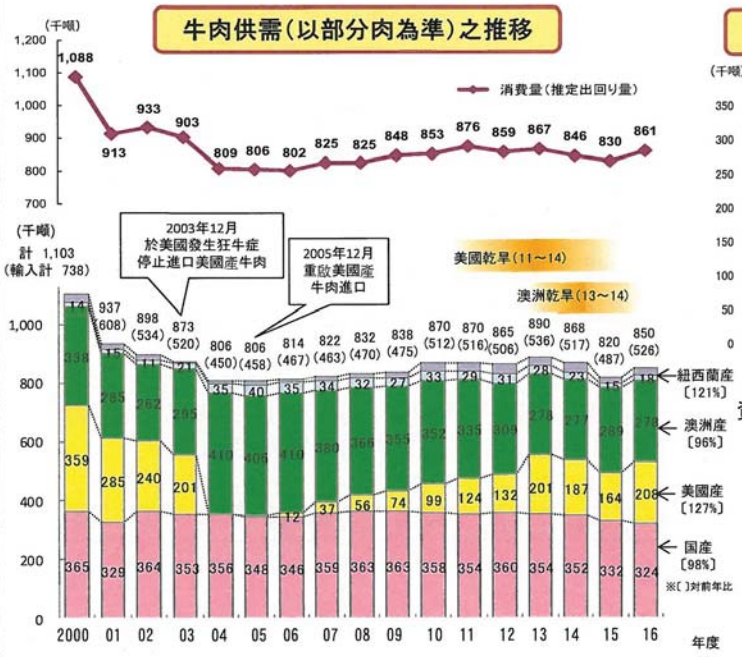
注１：也有將繁殖用母牛重複當肥育牛飼養的情形，所以兩者的飼養戶數和食用牛飼養戶數不一致。

注２：肥育牛為肉用肥育牛加上乳用牛之和。

10
日本

牛肉的供需動向

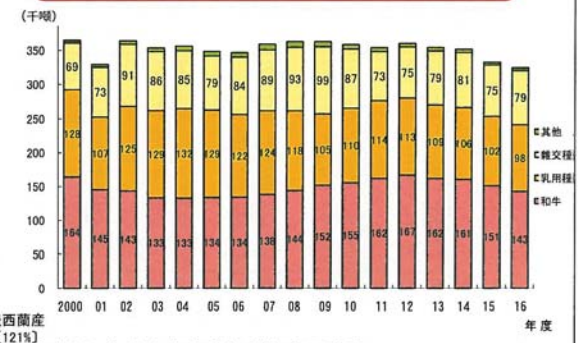
牛肉供需（以部分肉為準）之推移



資料：農林水產省「畜產物流通統計」「食料需給表」 財務省「貿易統計」
(獨)農畜產業振興機構「食用肉的保管狀況之調查」

注：推定流通量(原文:推定出回り量)＝生產量+輸入量+前年度庫存量－當年度在庫量－輸出量

不同品種的牛肉生產量（以部分肉為準）之推移

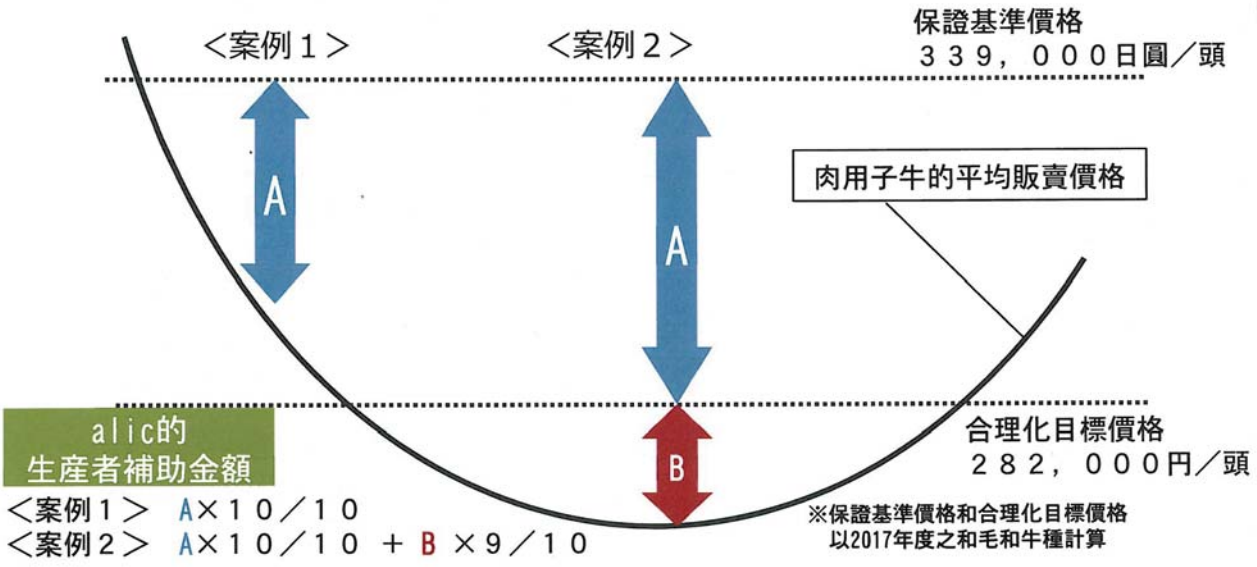


資料：農林水產省「畜產物流通統計」

11
日本

有關肉用子牛農場的經營安定對策

肉用子牛生產者補助金之結構



alic的
生產者補助金額

<案例１> A×１０／１０
<案例２> A×１０／１０ ＋ B ×９／１０

※保證基準價格和合理化目標價格
以2017年度之和毛和牛種計算

負擔比例 A alic
B alic：都道府縣：農家＝２：１：１

12 日本

＊１ 除此制度以外，還有其他的制度對黑毛和牛子牛生產者等給付補助金。
＊２ 對於肥育農家，也備有與豬Marukin相同的經營安定對策。

為了強化畜產的競爭力所採取的對策（主要對策）

○ **強化地區團體的收益能力（規模擴大、減少成本、提高附加價值等）**
→ 協助購置必須的設施、購買機械、購買家畜等

○ **擴大和牛生產以及確保乳用子代牛**
→ 對於和牛受精卵、判別性別之精液、提高繁殖成績的ICT機器進行補助

○ **以強化經營為目的之資金對策**
→ 延長償還期間、降低貸款利率、免除一部分保證金

○ **對於不同商品進行不同輸出的對策**
→ 藉由傳授腿肉、肋骨肉之食用方式和薄切技術，開創出新的牛肉料理市場（牛肉）

13 日本

最近的政策動向（主題）

○ **修正「有關畜產品價格安定之法律」為「有關畜產安定之法律」**
→ 法制化肉用牛肥育經營安定特別對策事業（牛Marukin）和養豬經營安定對策事業（豬Marukin），廢除指定食用肉價格安定制度

○ **預計將修正肉用子牛生產者補助金制度之補償基準價格水準**

○ **國會正審議修正指定生乳生產者團體制度**

○ **check off制度之檢討**
→ 就希望能法制化的業界，決定推動單位以及推動方式，並得到一定數量的生產者的支持（７５％以上），就會進行法制化。

14
日本

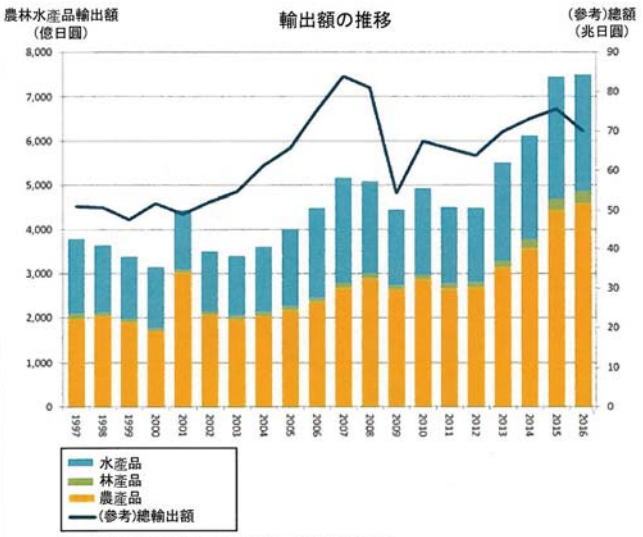
2. 輸出動向

15
日本

日本的農產品輸出狀況

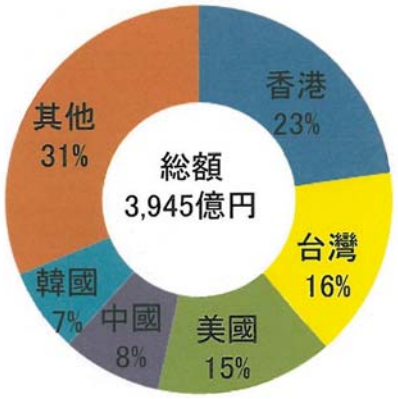
alic
Agric.,ture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

農林水產品輸入額的推移(1997年~2016年)



注:總輸出額是包含所有的工礦產品之總

農產品的主要輸 出對象國、地區 (2016年)



注:不含酒精飲料、菸品、珍珠之總額。

16
日本

豬肉的輸出

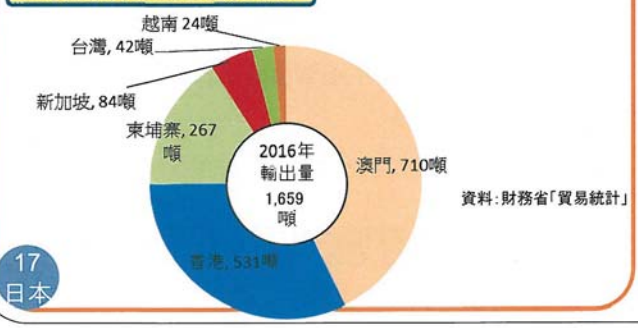
alic
Agric.,ture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

日本產豬肉的輸出實績

前年比
2016年
數量:111%
金額:105%

前年同期比
2017年(1-3月)
數量:166%
金額: 147%

日本產豬肉的輸出實績(國別)



資料:財務省「貿易統計」

2019年輸出目標 12億日圓(相當於1,000噸)

○ 戰略重點國
【輸出可能的國家】
香港、台灣、新加坡
【正在協議動物檢疫的國家】
中國、泰國

輸出國·地域之設施認定情況 (2017年4月現在)

	香港	台灣	新加坡	越南
設施數	104	13	4	37

出典:厚生勞動省網頁

豬肉統一標誌

日本豚 JAPANESE PORK

向日本迷推銷日本的食文化,擴大日本產豬肉愛好者

<今後的策略>

➢促進「日本品牌」的販賣(目標為至2020年度為止,於所有輸出戰略重點國、地區,進行豬肉統一標誌的商標登錄。2016年度以後的三年內,邀請4個國家的20位廚師來訪日本)

➢強化國內生產基礎(藉由豬隻育種改良,以及提高每頭母豬生產的仔豬數量等方式,降低生產成本)

➢確立有效率的流通體制(支援食用肉處理設施的重新整理備置)

17
日本

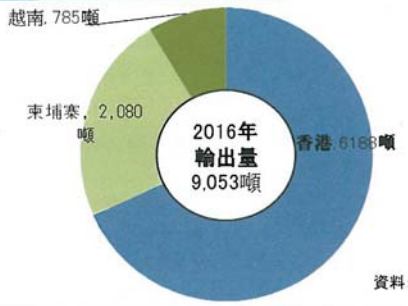
雞肉的輸出

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

日本產雞肉的輸出實績

前年比 2016年 數量:100% 金額:104%
前年比2017年(1-3月) 數量:107% 金額:111%

日本產雞肉的輸出實績(國別)



資料:財務省「貿易統計」

18
日本

2019年輸出目標 35億日圓(相當於14,000噸)

○ 戰略重點國
【輸出可能的國家】
香港
【正在協議動物檢疫的國家】
新加坡

輸出國·地域之設施認定情況 (2017年4月現在)

	香港	誤南
設施數	73	76

資料:厚生勞動省網頁

雞肉統一標誌

向日本迷推銷日本的食文化，擴大日本產雞肉愛好者

<今後的策略>

➢促進「日本品牌」的販賣(目標為至2020年度為止，於所有輸出戰略重點國、地區，進行雞肉統一標誌的商標登錄。

➢強化雞隻國內生產基礎的不同策略(繼續實施主要國產種雞的育種改良)

➢戰略性的進行動物檢疫協議等(目標為至2020年度為止，讓所有輸出戰略重點國、地區對日本解除入禁令)

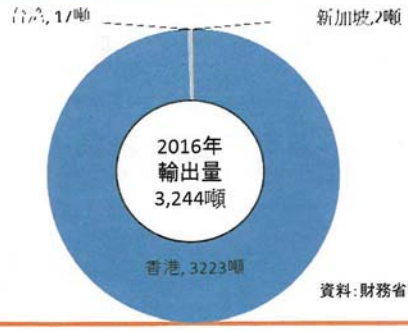
雞蛋的輸出

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

日本產雞蛋的輸出實績

前年比 2016年 數量:139% 金額:137%
前年同期比 2017年(1-3月) 數量:112% 金額:106%

日本產雞蛋的輸出實績(國別)



資料:財務省「貿易統計」

19
日本

2019年輸出目標 26億日圓(相當於10,000噸)

○ 戰略重點國
【輸出可能的國家】
香港、新加坡
【正在協議動物檢疫的國家】
韓國

輸出國·地域之設施認定情況 (2017年4月現在)

	香港	新加坡
設施數	128	5

出典:厚生労働省HP

雞蛋統一標誌

向海外推銷能活用日本蛋長處的食用方法，藉此擴張輸出

<今後的策略>

➢促進「日本品牌」的販賣(目標為至2020年度為止，於所有輸出戰略重點國、地區，進行雞蛋統一標誌的商標登錄。2016年度以後的三年內，邀請3個國家的15位廚師來訪日本)

➢確立有效率的生產及流通體制((2016年度以後、開發以海運輸出半熟蛋的技術)

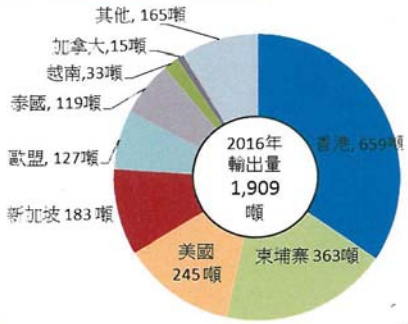
➢戰略性的進行動物檢疫協議等(目標為至2020年度為止，讓所有輸出戰略重點國、地區對日本解除輸入禁令)

牛肉的輸出

日本產牛肉的輸出實績

前年比 2016年 數量:119% 金額:123%
前年同期比 2017年(1-3月) 數量:145% 金額:148%

日本產雞肉的輸出實績(國別)



資料:財務省「貿易統計」

20
日本

2019年輸出目標 250億日圓(相當於4,000噸)

○ 戰略重點國家

【輸出可能的國家】

香港、新加坡、印尼、泰國、越南、阿拉伯聯合大公國、卡達、美國、加拿大、歐盟、俄羅斯、巴西

【正在協議動物檢疫的國家】

台灣、韓國、中國、馬來西亞、沙烏地阿拉伯

輸出國·地域之設施認定情況 (2017年3月現在)

	美國	加拿大	墨西哥	巴西	歐盟	俄羅斯等	紐西蘭	香港	阿拉伯聯合大公國	卡達	巴林	新加坡	菲律賓	澳門	泰國	越南	緬甸	印尼
施設數	10	8	8	4	4	2	10	10	4	3	2	12	8	60	59	64	43	1

出典:厚生労働省HP

向海外推展可活用和牛之長處的販賣方法、食用方法,藉以擴大輸出

＜今後的策略＞

➢活用(味道、外型)高品質的促進販賣(目標為至2020年度為止,於所有輸出戰略重點國、地區,進行和牛統一標誌的商標登錄。)

➢利用提供分級情報和生產履歷情報,更加增加和牛的附加價值(2017年度以後、以7國語言提供)

➢追求創造新的肉料理市場等(2016年度以後的三年內,邀請8個國家的50位廚師來訪日本)

➢維持、擴大和牛的生產量(2025年度為止擴大和牛的飼養頭數到186萬頭)

➢確立有效率的流通對策(2020年為止,增加三成以上能對應輸出美國、歐盟的設施的處理能力)

3. 打造品牌

21
日本

日本品牌化的動向

○ 在日本，相當積極地打造農畜產品的產地品牌。

○ 對於畜產品，農林水產省會指導其明確化該品牌生產者的概要、飼料與飼養方式等特徵，並指導其對外公布。

○ 根據業界新聞的統計，目前牛肉共有327個品牌，豬肉共有415個品牌。

（牛肉例子）「松阪牛」、「神戶牛」、總稱「山形牛」、「宮崎牛」「石垣牛」

（豬肉例子）「鹿兒島黑豬」、「ＴＯＫＹＯ Ｘ」、「Agu-（ＪＡ沖繩）」「平牧三元豬」、「日本之豬 大和豬」

○ 政府採取以下的政策進行品牌化。

①為了提高附加價值的政策→**６次產業化**

②保證農產品與地區的結合→**地理性標示保護制度**

③讓生產者更能了解生產過程→**ＧＡＰ制度**

④對海外宣傳日本的農產品→**ＪＡＳ規格**

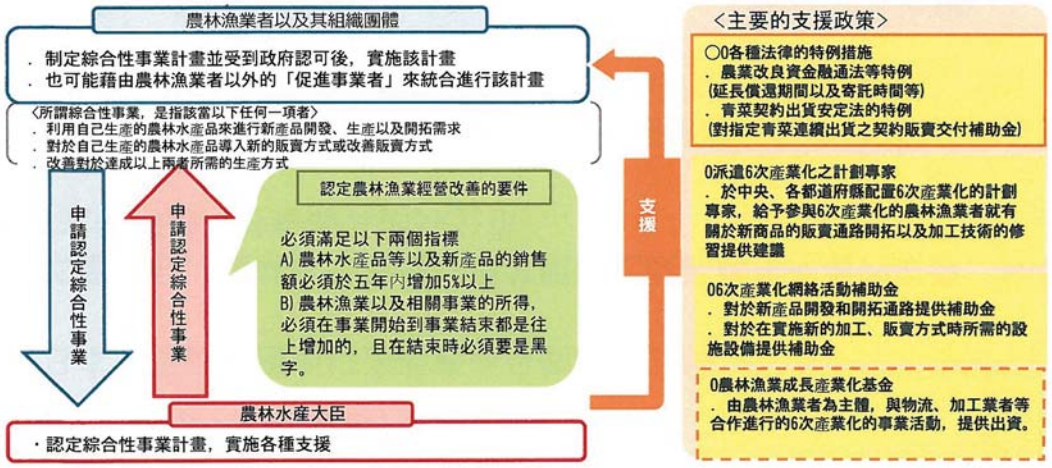
22 日本

何謂農林漁業的６次產業化

○ 意義

「將一級產業之農林漁業、二級產業之製造業、三級產業之零售業三者結合後，進行整體性的推動，活用地區資源並創造新的附加價值」之政策。

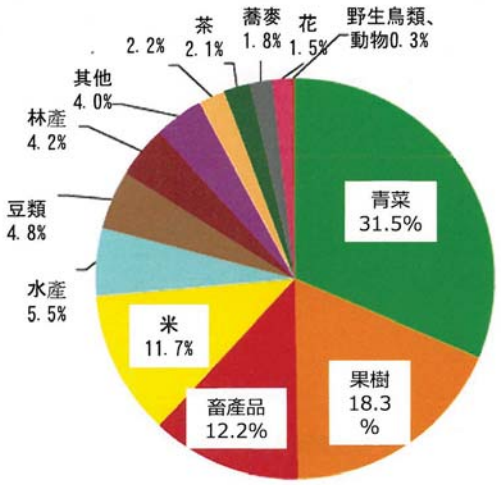
※ １次（生產）×２次（加工）×３次（販賣）＝６次產業化



23 日本

綜合性事業計畫的認定情況
（２０１７年４月１１日時點）

綜合性事業計畫之對象農林水產品的比例



※以複數農林水產品為對象的綜合性事業計畫也都計算在內。

綜合性事業計畫之事業內容的比例

加工	19.7
直銷	2.6
輸出	0.4
餐廳	0.3
加工、直銷	68.6
加工、直銷、餐廳	6.7
加工、直銷、輸出	1.6

24
日本

何謂地理性標示（GI:Geographical Indication）

定義：所謂地理性標示就是指某農林水產品、食物的名稱可以來特定此產品、食物的產地，且可以確定該產品的品質等的特性與其產地相結合。

地理性標示的例子　-以市田柿為例-

（例）　（例）市田柿　地名 ＋ 產品名

地理性表示

可以從市田柿這個名稱，了解其產地和產品特性

生產地

○人文特性
．發祥於下伊那郡高森町（舊市田村）
．「曬乾」過程長，細心揉捏

○自然特性
．因為日夜的溫差大，所以可以長出高甜度的原料柿子
．秋末到初冬會有河川霧形成，提供干柿良好的溫度和濕度環境

「主要可以歸因於」＝有相關性

產品特性

○品質
．「市田柿」甜度特別高
．口感相當彈牙

○社會上的評價
．具有高知名度

○其他
．漂亮的糖果顏色
．小顆容易食用
．表面覆有一層相當細密的白色粉狀物

25
日本

日本的地理性標誌保護制度的概要

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

制度的概要

(1)除登錄生產地和產品之外，也登錄「地理性標誌」(除了登錄時需繳交9萬日圓外，不需要繳交更新費用)

(2)對於有達到標準之商品，承認其可使用「地理性標誌」，給予其GI標誌

(3)行政單位取締不法使用地理性標誌者

(4) 只要加入登錄團體，生產者就可以使用「地理性標誌」。

效果

○只有符合標準的生產者才可以使用「地理性標誌」。

○只有符合品質的商品才可以在市場上流通。

○不須負擔訴訟等，就可以保護自己的品牌。

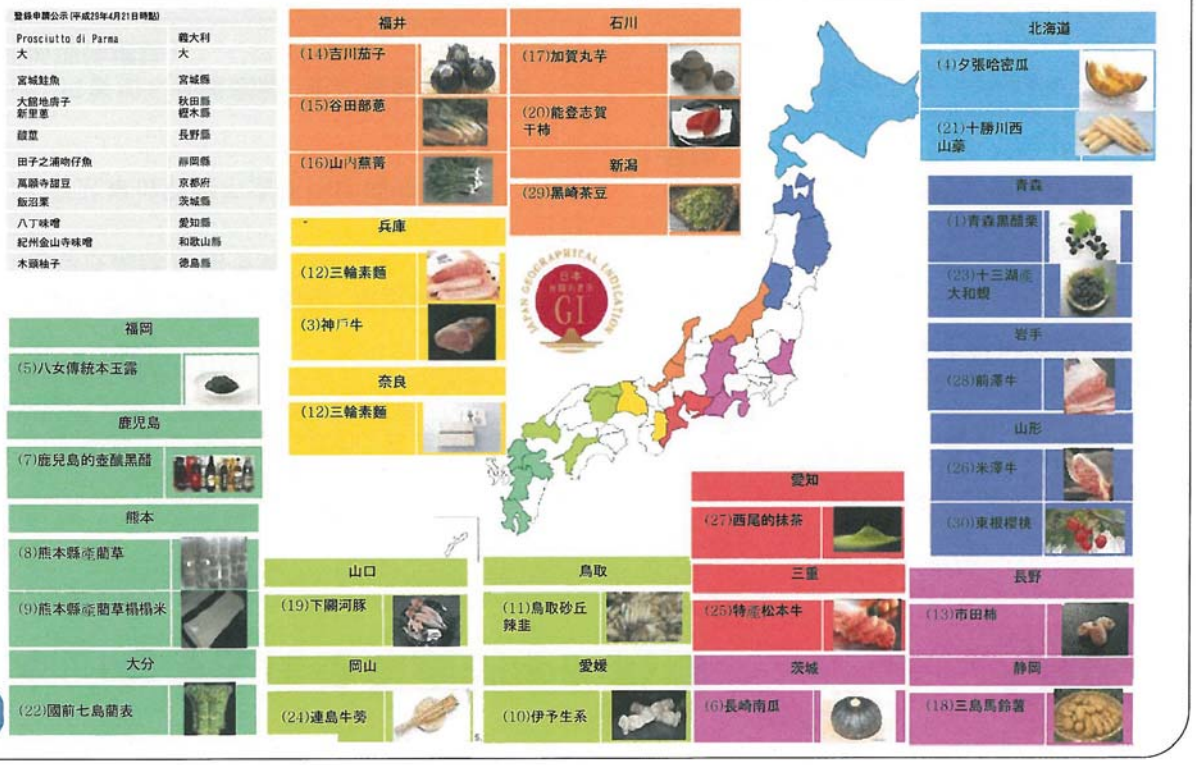
○是否地區共有的財產，該地區生產者都能使用。

26
日本

ＧＩ登録状況

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

○2015年12月22到現在 (2017年5月26日) 為止，有22個道縣登錄35個產品



27
日本

ＧＡＰ的推行

○　２０１７年3月３１日日本ＧＡＰ協會策劃訂定畜產品的ＧＡＰ，公布「ＪＧＡＰ家畜・畜產品」。

＜ＪＧＡＰ家畜・畜産物的重點＞

- **考量農場營運、食品安全、家畜衛生、環境保全、勞工安全、人權尊重、動物福祉等各項目的綜合性GAP**
- **以乳牛、肉用牛、豬、肉用雞、蛋鶏這5種畜種為對象**
- **審查、認證的規則等，準據於其他ＪＧＡＰ的基準**

○　今後將會推行與關連機關之協調，並會推動養成審查員和指導員，計於２０１７年夏天，建立基於JGAP家畜、畜產品基準書的認證體制。

良好農業規範(Good Agriculture Practice, GAP)：指農產品之產製過程，依照關係法令等的內容是沿著能定的檢查項目，農業生產活動的各工序正確由進行實施，記錄，檢查及評價的持續的的改善活動的事。

28
日本

ＪＡＳ法、ＦＡＭＩＣ法的改正

1．　制訂和推廣日本的農產品息息相關的多樣的ＪＡＳ規格

1 將JAS規格之對象從「產品品質」開始擴大

2 將JAS規格充實為較容易從企業和產地進行提案

3 進行對應新的JAS規格的JAS標誌概念之設計

【過去的ＪＡＳ規格的範圍】

將品質/成分/性能標準化的規格	將生產方法標準化的規格			將流通方法標準化的規格
(一般)JAS標誌	有機JAS標誌	特定JAS標誌	生產者情報表示JAS標誌	定溫管理流通JAS標誌
JAS 認定機關名	JAS 認定機關名	JAS 認定機關名	JAS 認定機關名	定溫管理流通 JAS 認定機關名

■　有關製程的規格

例如為了要推廣傳統抹茶，將我國特有的製程規格化

■　有關管理方式的規格

例如為了要強調新鮮度，對於定溫保管、運輸方式進行規格化。並認證有能力的企業。

因為是由受認證的企業來進行，所以可以強調其「新鮮」

■　有關測定、分析方法的規格

例如要強調讓魚不會有臭味的養殖技術，將測量分析臭味成分的方法進行規格化

證明「不遜色於野生的魚」

這是為了有證據來強調自己有很高的養殖技術

29
日本

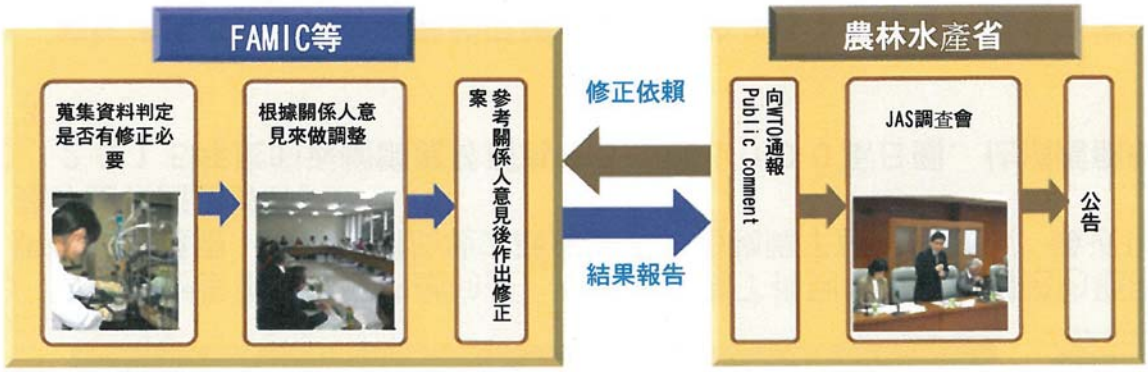
ＪＡＳ法、ＦＡＭＩＣ法之修法

2．齊備國際通用的認證標準

❶ 對應新的JAS規格，設立符合國際標準化機構所訂程序的認證流程

❷ 除此之外、(獨)農林水產消費安全技術中心(FAMIC)的工作內容中包含使JAS規格成為能幫助取得國際規格認證的墊腳石。

ＪＡＳ規格的制定、修正的流程



30 日本

（話題）有關鄉里納稅的動向

○ 有關於鄉里納稅最近的動向是，有很多人為了得到地方政府贈送的地區品牌牛肉的返禮，而爭相對於地方政府進行。禮物除了農產品以外，最近也可見iPad和商品券等。

○ ２０１５年度的返禮調度費用為６３２億６０００萬日圓，佔捐贈額的約３８％。

○ 總務省為了對應如此過熱的返禮品競爭，於２０１６年４月要求地方政府不要以容易換現的商品券或家電等當作返禮品。並於2017年4月要求返禮比例上限不得高於３０％ 。

【何謂鄉里納稅】

・對於都道府縣和市區町村進行捐贈(鄉里納稅)，超過鄉里納稅額2000日圓的金額，在一定的限額內，可全額扣減所得稅、個人住民稅。
・無論是對自己的故鄉，還是想支持的地方政府，都可以進行鄉里納稅。
・鄉里納稅額（人數）
２００８年　７２．６億日圓（３３．１千人）→ 2013年　１４１．９億日圓（１３３．９千人）
→ 2015年　１４７０．０億日圓（１２９５．３千人）

※在此統計有申告控除額的捐贈

31 日本

（話題） 有關農業領域的外籍勞力

國家戰略特別區域法暨構造改革特別區域法的修法

alic
Agriculture & Livestock Industries Corporation
独立行政法人 農畜産業振興機構

現 在

原則上禁止外國人進行單純勞力勞動

外國人技能實習制度

・現在有很多外國人以技能實習的名義受雇於農業領域。
實習期間 ： 最長3年內

・新制度將於2017年11月1日開始
實習期間： 最長5年內
這是為了要符合技能實習意旨所進行的調整

追加

國家戰略特別區域法暨構造改革特別區域法的修法

（國會正在審議）

・農業特區引入外籍勞力事業之計畫，是經過總理大臣認定後，可在特定區域內引入外籍勞工的事業之計畫(是出入國管理法中的特例措施)

・以於母國大學的農業系畢業、或已於日本完成技能實習的外國人為對象。

・需要有一定的日文能力。雇主必須要支付其與日本人同等以上的報酬。

・引入期間 ： 最長3～5年

・於地方農業協會的指導管理下進行勞動派遣，長期需求10人以上等符合條件的農業法人可以直接雇用。

32
日本

※此表作成時也參考了新聞報導

臺灣畜禽產品出口及品質管理策略

2017.6.7

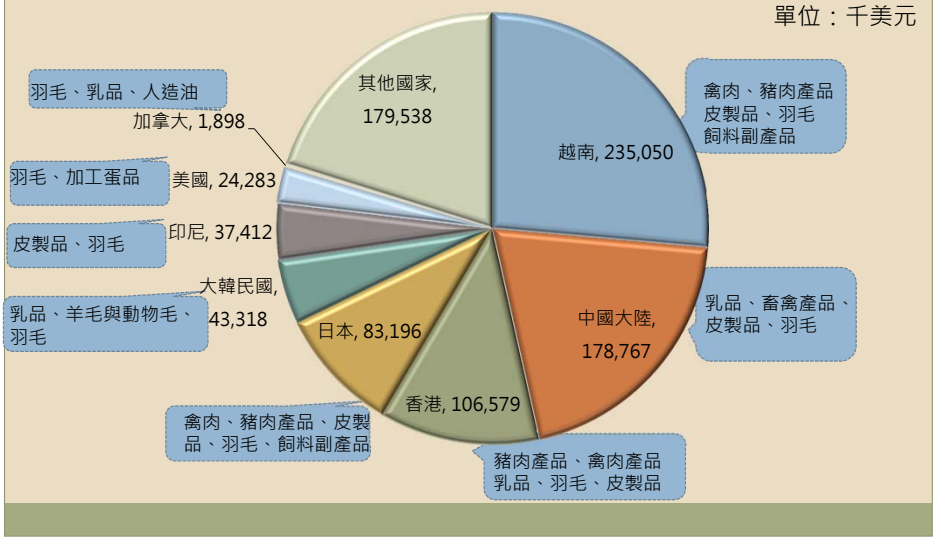
報告人：王旭昌組長

大綱

- 臺灣出口之畜產品產值與出口至日本之畜產品項
- 臺灣畜產品出口策略與品質管理策略
- 消費需求與品質認證

2016年臺灣出口之畜產品產值

單位：千美元



2016年臺灣出口至日本畜產品品項

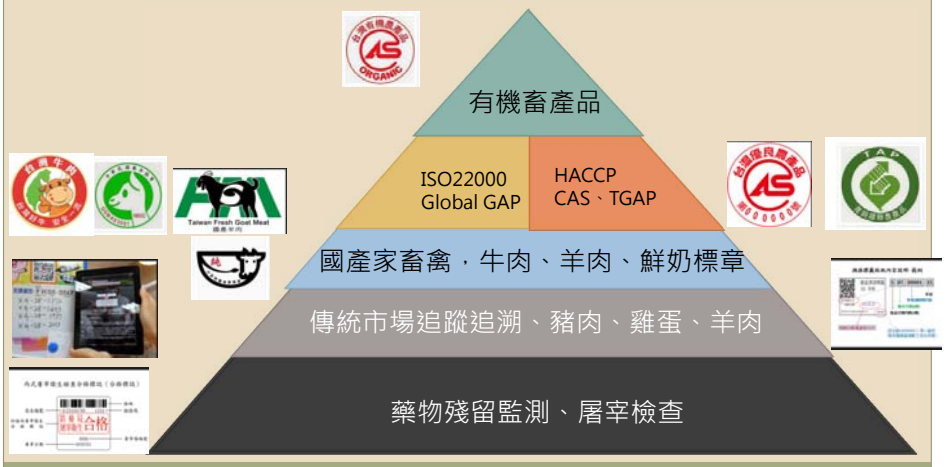
	重量(公噸)	價值(千美元
活畜禽及肉類	496	2,656
畜禽雜碎	0	4
乳品	6	14
羽毛	1,760	55,393
羊毛及其他動物毛	1,206	16,819
皮及其製品	5,058	2,090
養蜂業產品	21	1,597
種蛋	0	4
畜油脂	138	161
人造食油及起酥油	7	32
畜-飼料用副產品	1,623	653
其他畜產品	682	3772.864

	重量(公噸)	價值(千美元
活畜禽及肉類,豬	152	1,130
活畜禽及肉類,牛	118	216
活畜禽及肉類,雞	1	3
活畜禽及肉類,其他產品	225	1307
合計	496	2,656

臺灣畜產品出口策略

- 亞洲區：
  - 日本：以熟食加工品為主。
  - 香港：以熟食加工品為主。
  - 新加坡：以熟食加工品為主。
  - 馬來西亞：以加工肉品及清真認證產品為主。
- 美洲區：
  - 美國：以加工蛋品(皮蛋、鹹蛋)為主。

臺灣畜產品品質管理

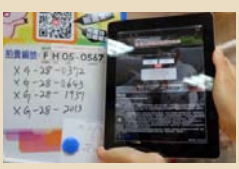


藥物殘留監測、屠宰檢查

- 畜禽藥物殘留監測措施：
  - 農委會主掌畜牧場監測畜禽用藥情形及輔導農民安全用藥。
  - 衛福部於市場抽驗市售產品，查核販售業者及食品業者。
- 所有畜禽上市前均經過獸醫師屠宰衛生檢查，提供消費者衛生安全之畜禽產品。

傳統市場追蹤追溯：牛肉、雞蛋、豬肉、羊肉

- 仍有相當比例的消費者習慣於傳統市場選購畜禽產品，為能有效追溯傳統市場販售端之肉品來源：
  - 2012年建構國產牛肉追溯系統。
  - 2015年9月起全面推動散裝雞蛋溯源標示管理制度。
  - 2016年建置國產生鮮豬肉追溯資訊網。
  - 2017年起逐步推動羊隻追溯系統。



國產標章：牛肉、羊肉、鮮奶標章

- 針對國產市占率較低的品項如肉牛、肉羊等，另推動國產牛肉、羊肉標章，提供民眾辨識選購國產品。

與國際接軌：ISO22000、Global GAP、HACCP

- ISO 22000：參照HACCP的原理，並融合GMP(食品良好操作規範)與GHP(食品良好　衛生規範)的精神。
- Global G.A.P.：全球良好農業生產規範。
- HACCP：Hazard Analysis & Critical Control Points，危害分析重要管制點

CAS、TGAP(1/2)

- CAS臺灣優良農產品標章(Certified Agricultural Standards)，
  - 原料以國產品為主。
  - 衛生安全符合要求。
  - 品質規格符合標準。
  - 包裝標示符合規定。

CAS 標章驗證品項			
肉品	食米	蔬果汁	醃漬蔬果
蛋品	生鮮截切水果	即時餐食	釀造食品
乳品	水產品	冷藏調理食品	點心食品
羽絨	生鮮食用菇	冷凍食品	林產品

CAS、TGAP(2/2)

- 臺灣良好農業規範（Taiwan Good Agriculture Practice, TGAP）：指農產品之產製過程，依照中央主管機關訂定之標準化作業流程及模式進行生產（含初級加工及屠宰）作業，有效排除風險因素，降低環境負荷，以確保農產品安全與品質之作業規範。應包含下列項目：
  - 生產流程圖。
  - 風險管理表。
  - 查核表。
  - 其他經中央主管機關指定之事項。

有機畜產品

- 有機農產品：符合中央主管機關訂定之有機規範，並經依本法規定驗證或進口經審查合格之農產品。不得使用化學農藥、化學肥料、動物用藥品或其他化學品。
  - 國內生產：於國內生產、加工、分裝及流通過程均需符合有機規範。
  - 國外生產：需有經我國公告核可之該國認證機構驗證，並經我國中央主管機關審查。
- 目前通過有機畜產品驗證品項：雞蛋、雞肉、奶粉。

國內學校要求的認證：4章1Q

- 4章
  - 吉園圃安全蔬果標章2.0
  - 產銷履歷農產品標章
  - CAS臺灣優良農產品標章
  - CAS有機農產品標章
- 1Q
  - 生產追溯QRcode

臺灣畜產品的出口品質管理

- 出口畜禽產品大部分均有HACCP、ISO22000驗證，另目前也推動global GAP。
- 出口品項仍以羽毛(經CAS驗證)為最大宗，畜禽產品較少。

敬請指教

農研機構 NARO National Agriculture and Food Research Organization

Site Map Contact Japanese

About NARO | Centers・Institutes | Research Programs | Global Initiatives | Outreach


New Glowing Silk

New soft-sticky rice cultivar "Fuwarimochi"


Road to Recovery


Recent Events

What is NARO?

NARO is the core institute in Japan for conducting research and development on agriculture and food. Our overall mission is to contribute to the development of society through innovations in agriculture and food, by promoting pioneering and fundamental R&D.

More

Publications
Workshops・Seminars
Career・Opportunities
Visitor Info

良と農の科学館

YouTube NARO Channel

researchmap

Institute of Radiation Breeding

Genebank

Insect Symposium

Topics | Events | Information

October 7, 2016
Recruitment of fixed-term research scientists

September 30, 2016
MOU signed between INRA and NARO

September 20, 2016
Food web model that predicts a stable green world in the terrestrial ecosystem

September 20, 2016
Efficient modification of flower shape and color patterns

September 16, 2016
FAO/IAEA-NARO Technical Workshop on Remediation of Radioactive Contamination in Agriculture

September 6, 2016
NARO signed a MOU with All-Russia Research Institute of Plant Protection

September 2, 2016
High duty cycle pulses suppress orientation flights of crambid moths

August 30, 2016
New soft-sticky rice cultivar "Fuwarimochi"

August 23, 2016
NARO Symposium: "Avian influenza and wild animals" on Sep 29, 2016 at JA Kyosai Conference Hall, Tokyo

August 23, 2016
HARC/NARO annual training on rice cultivation for 5th grade students of

Topics

Links | Privacy Policy | Terms of Use

農研機構
Corporate Number 7080005005207

農研機構 NARO National Agriculture and Food Research Organization

About NARO | Centers・Institutes | Research Programs | Global Initiatives | Outreach

English HOME > About NARO > NARO: An Overview

NARO: An Overview

The National Agriculture and Food Research Organization or NARO is the core institute in Japan for conducting research and development on agriculture and food. Our overall mission is to contribute to the development of society through innovations in agriculture and food, by promoting pioneering and fundamental R&D. We conduct technological development to make agriculture a competitive and attractive industry, and contribute to increasing the nation's food self-sufficiency rate. To this end, we conduct R&D to increase the productivity and safety of agriculture, and lessen production costs; and to promote new markets and future industries by developing value-added agricultural products, through incorporating market needs into respective products. In addition, we conduct R&D regarding global issues such as climate change, and the utilization of local agricultural resources to maximize the multi-functionality of agriculture. We regard the contribution to recovery from the Great East Japan Earthquake, and especially R&D in relation to the aftermath of the nuclear power station accident, as an important NARO mission. Achievements and intellectual properties become meaningful only when they are promulgated throughout society. NARO aims at the speedy implementation of our achievements by promoting public relations and promulgation efforts through industry-academia-government cooperation. Our missions are summarized a follows:

Establishment of Regional Farming Models

First, we set a goal to establish a regional farming model for each region, to contribute to the enhancement of production sites. Based on the research achievements of NARO, we will collaborate with national research institutes, universities and public corporations, to establish farming models adapted to each region. NARO and its regional research centers will play a major role in research on farm management, cultivation and cropping systems, ICT (Information and Communication Technology) and agricultural mechanization, livestock, horticulture, breeding, fertilizer and pest control.

Advancement in crop breeding using genomic selection

Breeding new cultivars and developing new technologies are essential to vigorous agricultural production. In particular, we regard advancement in crop breeding, which exploits research achievements in genome selection, as vital. The NARO Institute of Crop Science facilitates the speedy development of novel crops with highly desirable agronomic traits. For the time being, the research focus is rice, wheat and soybeans but in future this will be expanded to a wide range of crops, to advance breeding using genomic selection.

Incorporating market needs into research

The Agriculture and Food Business Research Center has been established to incorporate market needs into research, and thereby contribute to the health and quality of life. This research center will aim at enhancing research methods for industry-academia- government collaboration in developing functional products, as well as enhancing NARO's capacity to conduct consistent R&D from the production site to consumer's table.

Global issues and the utilization of local agricultural resources

The plans above involve future initiatives, but we consider it necessary to immediately emphasize and pursue cooperation regarding R&D projects relating to global issues and the utilization of local agricultural resources.

These tasks are fundamental to agriculture and farming communities, and a critical cornerstone of NARO's R&D. We must strengthen our R&D efforts regarding climate change, increasing the multi-functionality of agriculture and farming communities, development of biomass and reusable energy, utilization of abandoned fields and paddies, wildlife management, etc. The term 'environment', which is common to all these issues, is an important keyword for agricultural research. With the integration of the National Institute for Agro-Environmental Sciences (NIAES) into NARO, we will explore how R&D regarding the environment should incorporate environmental conservation-type agricultural R&D in the context of global issues.

Recovery from the Great East Japan Earthquake

R&D for recovery from the Great East Japan Earthquake is an important cornerstone of NARO's R&D mission. In 2012, we established the Agricultural Radiation Research Center in the Fukushima Prefecture, to respond to the nuclear power station accident. Based primarily in this center, we have been contributing to the development of decontamination technologies for farmland soil, and radioactive material transfer-control technologies for agricultural products; and will continue our efforts to restore productivity to all farms which are effected by the incident.

Creative research organization

Given the mission described above, NARO will aim to become a highly creative research organization, promoting gender equality and an open and comfortable working environment for our staff. At the same time, we will ensure rigorous operation, with full compliance and thorough risk management. In sum, NARO will seek to translate its goals into relevant terms for each member of its staff, while at the same time promoting a strong sense of unity and contribution to society.

National Institute of Animal Health, NARO

Livestocks play an important role in our lives. Animal products such as milk, meat, and eggs supply the proteins we need to stay healthy and build strong bodies. Safe, high quality animal products are produced from healthy livestocks. Animals also contribute to the advancement of biotechnology and life sciences. The preservation of animal health through the implementation of preventive measures to contain various diseases is an important goal. The National Institute of Animal Health (NIAH) covers basic research to diagnosis and contributes to support animal health.

NIAH News

Technical support in the fight against FMD and TADs for Mongolia through the OIE

Updated on Jan 6, 2016

The National Institute of Animal Health (NIAH) provides technical support in the fight against foot-and-mouth disease (FMD) and other transboundary animal diseases (TADs) for Mongolia through the World Organization for Animal Health (OIE). FMD is one of the most feared livestock diseases: it is highly infectious and a serious threat to the economic value of livestock. The NIAH, which is the only institution providing definite diagnosis of FMD in Japan, has been designated as a collaborating center of the OIE. The NIAH decided to provide technical support to the State Central Veterinary Laboratory (SCVL) in Mongolia to improve the diagnostic techniques for FMD and other TADs through the twinning project, which has been approved by the OIE.

http://www.naro.affrc.go.jp/english/niah/about/index.html

農研機構
NARO National Agriculture and Food Research Organization

About NARO | Centers・Institutes | Research Programs | Global Initiatives | Outreach

English HOME > NIAH > About

National Institute of Animal Health, NARO

About

For Animal Health, For Human Health

Livestocks play an important role in our lives. Animal products such as milk, meat, and eggs supply the proteins we need to stay healthy and build strong bodies. Safe, high quality animal products are produced from healthy livestocks. Animals also contribute to the advancement of biotechnology and life sciences. The preservation of animal health through the implementation of preventive practices to contain various diseases is an important goal. The National Institute of Animal Health (NIAH) covers basic research to diagnosis and contributes to support animal health.

Research Areas

Viral diseases
We have been conducting basic and applied researches on viral diseases of cattle, swine, poultry and others. We are focusing on the viral gene functions and host-pathogen interactions, and are developing diagnostic and preventive tools for them.

Bacterial and parasitic diseases
We focus on a wide range of bacterial and parasitic diseases of domestic animals including zoonosis. First of all, we elucidate molecular mechanisms of bacterial and parasitic diseases. Using the obtained results, we are going to develop new methods of diagnosis, effective treatment, and prevention for these diseases.

Transboundary diseases
Our research activities cover avian and swine influenza, arbovirus-associated diseases and exotic infectious diseases, such as Foot-and-Mouth disease. We scrutinize characteristics of those pathogens and develop technologies required for accurate diagnosis and for prevention of the diseases.

Pathology and pathophysiology
We conduct pathophysiological investigations for preventing production diseases, opportunistic diseases, mastitis and reproductive disorders. Mucosal vaccines for mastitis are attempted. Various diseases are diagnosed by pathological, biochemical and toxicological methods and the improvement of the methods are also attempted. For checking the individual animal health status, biosensor technologies are challenged.

Animal disease epidemiology
Using epidemiological methods, we analyze the diseases situations, their spread patterns and economic damages. Our researches aim at clarifying risk factors of the disease outbreaks, and establishing effective control and preventive measures.

Technology for feed safety
We conduct research on the safety of feed, livestock and animal products by developing detection methods and pathogenicity and toxicity evaluation for risk factors to humans and livestock such as food poisoning bacteria, mycotoxins, environmental pollutants and prions.

Services

Production of veterinary biologicals
We manufacture diagnostic agents, vaccines, and other medicines which are indispensable to the protection of farm stock against infectious diseases in Japan. We supply these biologicals primarily to institutions responsible for disease prevention and control, and animal quarantine in Japan.

Diagnostic services

In order to improve animal health in Japan, we provide diagnostic services using advanced technologies to diagnose novel diseases including exotic diseases in response to requests from central and local governments of Japan.

Technical cooperation and training programs
We conduct several types of training courses for animal health in response to the requests from governments and international organizations. We actively cooperate in the international development of technology.

History of NIAH

1891	Founded as the Epizootics Laboratory, annexed to the Bureau of Agricultural Affairs, the Ministry of Agriculture and Commerce, in Nishigahara, Tokyo.
1921	Established as an independent organization, the Institute for Infectious Diseases of Animals.
1937	Started to relocate to Kodaira, Tokyo (Finished in 1952).
1947	Renamed to the National Institute of Animal Health.
1979	Relocated to Tsukuba Science City.
2001	Reorganized as the National Insitute of Animal Health, within the National Agricultural Research Organization (NARO).
2003	NARO reorganized as the National Agriculture and Bio-oriented Research Organization (NARO).
2006	NARO reorganized as the National Agriculture and Food Research Organization (NARO).
2016	NARO reorganized with integration of 3 national research institutes.

農研機構 NARO National Agriculture and Food Research Organization

National Institute of Animal Health, NARO

Message

National Institute of Animal Health (NIAH) is the leading institute on animal health in Asia

I have been the Director General of the National Institute of Animal Health (NIAH) since this April. I do really feel heavy responsibility on this position. However I trust that I could overcome this situation with the support from my friends and NIAH staff.

The NIAH is the only research organization on the field of animal health in Japan. Although our organization, National Agriculture and Food Research Organization (NARO), was reorganized with the integration of 3 national research institutes, the name in English as well as the system of NIAH was not changed.

The NIAH has been designated as a national reference laboratory to diagnose and to prevent the outbreak or spread of domestic animal infectious diseases based on the Act of Domestic Animal Infectious Diseases Control. In 2010, NIAH together with the National Veterinary Assay Laboratory (NVAL) of the Ministry of Agriculture, Forestry and Fisheries (MAFF) has also been designated as collaborating center of the World Organization for Animal Health (OIE) on "Diagnosis and Control of Animal Diseases and Veterinary Product Assessment in Asia". Then in May 2015, NIAH has been chosen by OIE and the United Nations Food and Agriculture Organization (FAO) as a holding facility of rinderpest virus containing material, in recognition of its advanced quarantine management system and achievements in vaccine development against rinderpest, cattle plague, making Japan as one of the 4 countries in the world and the only Asian country with approved holding facilities. From January 2016, NIAH has been designated by OIE to provide technical support to the Mongolia Central Veterinary Institute in the fight against foot-and-mouth disease (FMD) and other transboundary animal diseases (TADs) for Mongolia, once again showing the growing recognition of NIAH in the international community. In addition, NIAH has also been designated as reference laboratory of 5 important animal diseases to make significant contributions in maintenance and safety of animal health. Furthermore, NIAH as the national reference laboratory, will cooperate with the Animal Health Division of the MAFF Food Safety Consumer Affairs Bureau in the OIE evaluation of the Performance of Veterinary Service (PVS), a global program for sustainable improvement of a country's compliance with OIE standards.

We will continue to contribute in preventing animal diseases not only in Japan but throughout the world to provide mankind with a safe and healthy livestock resources.

Kenichi SAKAMOTO
Director-General
National Institute of Animal Health, NARO

農研機構 NARO National Agriculture and Food Research Organization

National Institute of Animal Health (NIAH)

Topics in Animal Health Research 2014

01. Development of a genotyping method for predicting the serotypes of *Streptococcus suis*

02. Characteristics of *Salmonella* 4,[5],12:i:- as a monophasic variant of *S.* Typhimurium

03. Development of a portable suction trap equipped with ultraviolet light emitting diodes for efficient collection of haematophagous *Culicoides* biting midges

04. Development of a reverse-transcription polymerase chain reaction assay to detect bovine ephemeral fever virus gene

05. Development of rapid detection and differentiation method of typical and atypical *Melissococcus plutonius* strains

06. Application of a SYBR® Green One-Step Real-time Reverse Transcription-PCR Assay to Detect Type 1 Porcine Reproductive and Respiratory Syndrome Virus

07. The first isolation of genotype C bovine parainfluenza virus type 3 in Japan

08. Surveillance of gastro-intestinal diseases in cows in the Yamagata Prefecture from 2002 to 2011

09. First isolation of border disease virus in Japan is from a pig farm with no ruminants

10. Relationship between *Melissococcus plutonius* isolates from different countries

11. Isolation and characterization of a new serovar K12:O3 of *Actinobacillus pleuropneumoniae*

12. Isolation and characterization of new genetically atypical strains of *Actinobacillus pleuropneumoniae* serovar 6

13. Mutagenesis in the major outer membrane protein gene of *Histophilus somni* by an allelic exchange method

14. Experimental infection of cattle and goats with a foot-and-mouth disease virus isolated from the 2010 epidemic in Japan

15. Dose-dependent responses of pigs infected with the foot-and-mouth disease virus O/JPN/2010 by intranasal and intraoral routes

16. Evaluation of monoclonal antibody-based sandwich direct ELISA (MSD-ELISA) for antigen detection of foot-and-mouth disease virus using clinical samples

17. Amino acid substitutions that affect the pathogenicity of highly pathogenic avian influenza virus

18. Development of a vaccine against highly pathogenic avian influenza virus by attenuation using reverse genetics

19. Reassortant swine influenza viruses isolated in Japan contain genes from pandemic A(H1N1)2009

20. GT1-7 cells show susceptibility to specific mouse-passaged field scrapie isolates with a long incubation period

21. Ultrasensitive detection of PrP^{Sc} in the cerebrospinal fluid and blood of macaques infected with bovine spongiform encephalopathy prions

22. Development of a new bolus-type rumen sensor and continuous monitoring of rumen motility in cattle

23. Knockout serum replacement improves the development of porcine blastocysts produced *in vitro*

24. Monoclonal antibody-based competitive enzyme-linked immunosorbent assay for detection of antibodies against O:4 *Salmonella* in the sera of livestock and poultry

25. Lineage-specific distribution of IS-excision enhancer in enterotoxigenic *Escherichia coli* isolated from swine

26. Localization of fumonisin, a fungal mycotoxin, and determination of its concentration in different areas of corn ear

27. Injuries among the staff engaged in foot-and-mouth disease eradication, 2010 epidemic in Japan.

28. Evaluation of the transmission risk of foot-and-mouth disease in Japan

29. Parameters contributing to improved reproductive performance on farrow-to-finish swine farms in Japan

30. Effects of porcine reproductive and respiratory syndrome on the productivity of swine farms in Japan

31. Complete genome sequencing of two *Mycoplasma* species causing bovine mastitis

32. Development of molecular epidemiological analysis methods for *Mycoplasma californicum* involved in bovine mastitis

33. Evidence of clonal dissemination and replacement by molecular typing of *Salmonella enterica* serovar Enteritidis isolates from food-producing animals in Japan by multilocus variable-number tandem repeat analysis

89

National Institute of Animal Health, NARO

Organization

Director- General

- Department of Planning and General Administration
  - Deputy Director
  - Planning and Cooperation Section
    - Coordinator for Animal Health Government Affairs
    - Coordinator for Communications
    - Planning Team
    - Fund Management Team
    - Cooperation Team
  - General Administration Section
    - General Affairs Team
    - Accounting Team
    - Kodaira Administration Team
    - Kagoshima Administration Team
    - Sapporo Administration Team
  - Risk Management Section
    - Coordinator for Risk Management
    - Coordinator for Safety Management
- Biosafety Officer
- Biorisk Manager for Exotic Diseases
- Department of Animal Disease Control and Prevention
  - Biologicals Production Group
    - Safety Management Section
    - Quality Assurance Section
    - Biologicals Production Section
      - Technical Services for Quality Control
      - Technical Services for Biologicals Production
  - Diagnosis Supporting Group
    - Quality Control Officer
      - Technical Service Team for Laboratory Diagnosis
    - Biological Resource Officer
    - Animal Health Information Officer
  - Technical Support Center
    - Sapporo Technical Support Team
    - Kodaira Technical Support Team

Kagoshima Technical Support Team

- Director of Exotic Disease Research Station
- Senior Coordinator of Hokkaido Research Station
- Senior Coordinator of Kyushu Research Station
- Division of Viral Disease and Epidemiology
  - Bovine Viral Disease Unit
  - Swine Viral Disease Unit
  - Molecular Virology Unit
  - Viral infection and.Immunity Unit
  - Epidemiology Unit
- Division of Transboundary Animal Disease
  - Animal Influenza Unit
  - Prion Disease Unit
  - Exotic Disease Research Unit
  - Subtropical Disease Control Unit
- Division of Bacterial and Parasitic Disease
  - Intracellular Pathogen Unit
  - Bacterial Pathogenesis Research Unit
  - Mycobacterial Disease Unit
  - Enteric Pathogen Unit
  - Parasitic Disease Unit
- Division of Pathology and Pathophysiology
  - Clinical Biochemistry Unit
  - Theriogenology Unit
  - Toxicology Unit
  - Pathology Unit
  - Dairy Hygiene Unit

69

農研機構
NARO National Agriculture and Food Research Organization

National Institute of Animal Health, NARO

Contact

NIAH Headquarters

3-1-5 Kannondai, Tsukuba, Ibaraki 305-0856, Japan
TEL: +81-29-838-7713
FAX: +81-29-838-7880

Exotic Diseases Research Station

6-20-1 Josuihoncho, Kodaira, Tokyo 187-0022, Japan
TEL: +81-42-321-1441
FAX: +81-42-325-5122

Hokkaido Research Station

4 Hitsujigaoka, Toyohira, Sapporo, Hokkaido 062-0045, Japan
TEL: +81-11-851-5226
FAX: +81-11-853-0767

Kyushu Research Station

2702 Chuzan, Kagoshima, Kagoshima 891-0105, Japan
TEL: +81-99-268-2078
FAX: +81-99-268-3088

Mail form

Mail form

Organization of NIAH

Hokkaido Research Station (Sapporo, Hokkaido)

Dairy Hygiene Unit

Headquarters (Tsukuba)

Department of Animal Disease Control and Prevention

Division of Viral Disease and Epidemiology

Division of Transboundary Animal Disease

Division of Bacterial and Parasitic Disease

Division of Pathology and Pathophysiology

Exotic Disease Research Station (Kodaira, Tokyo)

Exotic Disease Research Unit

Kyushu Research Station (Kagoshima, Kagoshima)

Subtropical Disease Control Unit

16

Numbers of employees (2010～2014)

Year	Permanent employees			Temporary employee	Total
	Researchers	Clerical employees	Supporting researchers		
2010	129	43	70	113	355
2011	129	40	68	105	342
2012	122	40	66	107	335
2013	117	35	64	88	304
2014	113	36	61	93	303

17

Budget (2010～2014)

(million JPY)

Year	Bonus					Research budget				Total
	employeement cost	operating cost	general administrative cost	income	subtotal	MAFF	MEXT	others	subtotal	
2011	2,059	944	80	20	3,103	730	111	74	915	4,019
2012	1,841	935	88	26	2,891	697	139	73	909	3,800
2013	1,777	919	80	29	2,805	604	253	83	940	3,745
2014	1,903	972	63	30	2,967	552	122	116	790	3,757

Publication List (2014.4～2015.3)

Anisuzzaman, Hatta,T., Miyoshi,T., Matsubayashi,M., Islam,M.K., Alim,M.A., Anas,M.A., Hasan,M.M., Matsumoto,Y., Yamamoto,Y., Yamamoto,H., Fujisaki,K., Tsuji,N.
Longistatin in tick saliva blocks advanced glycation end-product receptor activation
Journal of Clinical Investigation. 124(10), p.4429-4444 (2014)

Arai,R., Miyoshi-Akiyama,T., Okumura,K., Morinaga,Y., Wu,M., Sugimura,Y., Yoshiyama, M., Okura,M., Kirikae,T., Takamatsu,D.
Development of duplex PCR assay for detection and differentiation of typical and atypical *Melissococcus plutonius* strains
Journal of Veterinary Medical Science. 76(4), p.491-498 (2014)

Bellis,G.A., Gopurenko,D., Cookson,B., Postle,A.C., Halling,L., Harris,N., Yanase,T., Mitchell,A.
Identification of incursions of *Culicoides* Latreille species (Diptera : Ceratopogonidae) in Australasia using morphological techniques and DNA barcoding
Austral Entomology. 54. 332-338 (2014)

Bui,V.N., Mizutani,T., Nguyen,T.H., Trinh,D.Q., Awad,S.S., Minoungou,G.L., Yamamoto,Y., Nakamura,K., Saito,K., Watanabe,Y., Runstadler,J., Huettmann,F., Ogawa, H., Imai,K.
Characterization of a genetic and antigenic variant of avian paramyxovirus 6 isolated from a migratory wild bird, the red-necked stint (Calidris ruficollis)
Archives of Virology. 159(11), p.3101-3105 (2014)

Fukai,K., Yamada,M., Morioka,K., Ohashi,S., Yoshida,K., Kitano,R., Yamazoe,R., Kanno, T.
Dose-dependent responses of pigs infected with the foot-and-mouth disease virus O/JPN/2010 by intranasal and intraoral routes
Archives of Virology. 160(1), p.129-139 (2015)

Hagiwara,S., Mori,K., Okada,H., Oikawa,S., Nagahata,H.
Acute *Escherichia coli* mastitis in dairy cattle: diagnostic parameters associated with poor prognosis
Journal of Veterinary Medical Science. 76(11), p.1431-1436 (2014)

Hata,E.
Complete Genome Sequence of *Mycoplasma canadense* Strain HAZ 360_1 from Bovine Mastitic Milk in Japan

Genome announcement. 2(5), pii: e00984-14 (2014)

Hata,E., Murakami,K.
Complete Genome Sequence of *Mycoplasma californicum* Strain HAZ160_1 from Bovine Mastitic Milk in Japan
Genome announcement. 2(4), pii: e00684-14 (2014)

Hata,E., Suzuki,K., Hanyu,H., Itoh,M., Higuchi,H., Kobayashi,H.
Molecular Epidemiology of Cases of *Mycoplasma californicum* Infection in Japan
Applied and Environmental Microbiology. 80(24), p.7717-7724 (2014)

Hidano,A., Yamamoto,T., Hayama,Y., Muroga,N., Kobayashi,S., Nishida,T., Tsutsui,T.
Antimicrobial Resistance among Campylobacter Isolates Obtained from Retail Chicken Meat and Offal Products in Japan
Japanese Journal of Infectious Diseases. 67(4), p.315-317 (2014)

Hiraizumi,M., Tagawa,Y.
Isolation and characterization of flagellar filament from zoospores of *Dermatophilus congolensis*
Veterinary Microbiology. 173(1-2), p.359-366 (2014)

Ido,N., Lee,K., Iwabuchi,K., Izumiya,H., Uchida,I., Kusumoto,M., Iwata,T., Ohnishi,M., Akiba,M.
Characteristics of *Salmonella enterica* serovar 4,[5],12:i:- as a monophasic variant of serovar Typhimurium
PLoS ONE. 9(8):e104380(2014)

Iseki,H., Takagi,M., Kuroda,Y., Katsuda,K., Mikami,O., Tsunemitsu,H., Yamakawa,M.
Application of a SYBR®Green one step real-time RT-PCR assay to detect type 1 porcine reproductive and respiratory syndrome virus
Journal of Veterinary Medical Science. 76(10), p.1411-1413 (2014)

Ito,H., Katsuragi,K., Akama,S., Yuzawa,H.
Isolation of atypical genotype Actinobacillus pleuropneumoniae serotype 6
Journal of Veterinary Medical Science. 76(4), p.601-604 (2014)

Ito,H., Matsumoto,A.
Isolation and genetic characterization of an Actinobacillus pleuropneumoniae serovar K12:O3 strain

Journal of Veterinary Diagnostic Investigation. 27(1), p.102-106 (2015)

Kasuya,K., Yoshida,E., Harada,R., Hasegawa,M., Osaka,H., Kato,M., Shibahara, T..
Systemic *Streptococcus dysgalactiae* subspecies *equisimilis* Infection in a Yorkshire pig with severe disseminated suppurative meningoencephalomyelitis
Journal of Veterinary Medical Science. 76(5) p.715-718 (2014)

Kato,T., Shirafuji,H., Tanaka,S., Sato,M., Yamakawa,M., Tsuda,T., Yanase,T.
Bovine arbovirus in *Culicoides* biting midges and sentinel cattle in southern Japan from 2003 to 2013
Transboundary and Emerging Diseases. (2015)

Lee,K., Kusumoto,M., Sekizuka,T., Kuroda,M., Uchida,I., Iwata,T., Okamoto,S., Yabe,K., Inaoka,T., Akiba,M.
Extensive amplification of GI-VII-6, a multidrug resistance genomic island of *Salmonella enterica* serovar Typhimurium, increases resistance to extended-spectrum cephalosporin
Frontiers in Microbiology. 6:78. (2015)

Kitani,H., Sakuma,C., Takenouchi,T., Sato,M., Yoshioka,M., Yamanaka,N.
Establishment of c-myc-immortalized Kupffer cell line from a C57BL/6 mouse strain
Results in Immunology. 4, p.68-74 (2014)

Kobayashi,A., Takahashi,S., Ono,M., Tanaka,K., Kishima,M., Akiba,M., Uchida, I.
Molecular typing of *Salmonella* enterica serovar Enteritidis isolates from food-producing animals in Japan by multilocus variable-number tandem repeat analysis: evidence of clonal dissemination and replacement.
Acta Veterinaria Scandinavica. 56(1), (2014)

Koczula,A., Willenborg,J., Bertram,R., Takamatsu,D., Valentin-Weigand,P., Goethe,R.
Establishment of a Cre recombinase based mutagenesis protocol for markerless gene deletion in *Streptococcus suis*
Journal of Microbiological Methods. 107, p.80-83 (2014)

Konishi,M., Ohkura,T., Shimizu,M., Akiyama,M., Kameyama,K., Takeuchi,K.
Complete genome sequence of the first isolate of genotype C bovine parainfluenza virus type 3 in Japan
Genome Announcements. 2 (6) e01215-14 (2014)

Kurebayashi,Y., Takahashi,T., Otsubo,T., Ikeda,K., Takahashi,S., Takano,M., Agarikuchi,T., Sato,T., Matsuda,Y., Minami,A., Kanazawa,H., Uchida,Y., Saito,T., Kawaoka, Y., Yamada,T., Kawamori,F., Thomson,R., von Itzstein,M.8., Suzuki,T.
Imaging of influenza virus sialidase activity in living cells
Scientific Reports. 2(4), p.4877 (2014)

Lakkitjaroen,N., Takamatsu,D., Okura,M., Sato,M., Osaki,M., Sekizaki,T.
Capsule loss or death: The position of mutations among capsule genes sways the destiny of *Streptococcus suis*
FEMS Microbiology Letters. 354(1), p.46-54 (2014)

Langeveld,J.P., Jacobs,J.G., Erkens,J.H., Baron,T., Andréoletti,O., Yokoyama,T., van Keulen,L.J., van Zijderveld,F.G., Davidse,A., Hope,J., Tang,Y., Bossers,A.
Sheep prions with molecular properties intermediate between classical scrapie, BSE and CH1641-scrapie
PRION. 8(4), p.296-305 (2014)

Lemire,P., Roy,D., Fittipaldi,N., Okura,M., Takamatsu,D., Bergman,E., Segura, M.
Implication of TLR - but not of NOD2- signaling pathways in dendritic cell activation by group B *Streptococcus* serotypes III and V
PLoS ONE. 9(12), e113940 (2014)

Marthaler,D., Suzuki,T., Rossow,K., Culhane,M., Collins,J., Goyal,S., Tsunemitsu, H., Ciarlet,M., Matthijnssens,J.
VP6 genetic diversity, reassortment, intragenic recombination ans classification of rotavirus B in American and Japanese pigs
Veterinary Microbiology. 172(3-4), p.359-366 (2014)

Mase,M., Kanehira,K.
Surveillance of avian paramyxovirus serotype-1 in migratory waterfowls in Japan between 2011 and 2013
Journal of Veterinary Medical Science. 77(3) p.381-385 (2015)

Mase,M., Nakamura,K.
Phylogenetic Analysis of Fowl Adenoviruses Isolated from Chickens with Gizzard Erosion in Japan
Journal of Veterinary Medical Science. 76(11) p.1535-1538 (2014)

Miyazawa,K., Okada,H., Iwamaru,Y., Masujin,K., Yokoyama,T.
Susceptibility of GT1-7 cells to mouse-passaged field scrapie isolates with a long incubation
PRION. 8(4), p.306-313 (2014)

Morioka,K., Fukai,K., Sakamoto,K., Yoshida,K., Kanno,T.
Evaluation of Monoclonal Antibody-Based Sandwich Direct ELISA (MSD-ELISA) for Antigen Detection of Foot-and-Mouth Disease Virus Using Clinical Samples
Plos ONE. 9(4), e94143 (2014)

Morozumi,T., Iseki,H., Toki,D., Takagi,M., Tsunemitsu,H., Uenishi,H.
Concise and Broadly Applicable Method for Determining the Genomic Sequences of North-American Type Porcine Reproductive and Respiratory Syndrome Viruses in Various Clusters
Journal of Veterinary Medical Science. 76(9), p.1249-1255 (2014)

Mumba,C., Squarre,D., Mwase,M., Yabe,J., Shibahara, T..
Calcinosis circumscripta in a captive African cheetah (Acinonyx jubatus)
Asian Pacific Journal of Tropical Biomedicine. 4(10), p.832-834 (2014)

Murayama,Y., Masujin,K., Imamura,M., Ono,F., Shibata,H., Tobiume,M., Yamamura,T., Shimozaki,N., Terao,K., Yamakawa,Y., Sata,T.
Ultrasensitive detection of PrP(Sc) in the cerebrospinal fluid and blood of macaques infected with bovine spongiform encephalopathy prion
Journal of General Virology. 95(11), p.2576-2588 (2014)

Muroga,N., Yamamoto,T., Hayama,Y., Kobayashi,S., Hidano,A., Tsutsui,T.
Injuries to staff engaged in foot-and-mouth disease eradication in Japan
Occupational Medicine. 65(1), p.45-48 (2015)

Nemoto,M., Oue,Y., Morita,Y., Kanno,T., Kinoshita,Y., Niwa,H., Ueno,T., Katayama,Y., Bannai,H., Tsujimura,K., Yamanaka,T., Kondo,T.
Experimental inoculation of equine coronavirus into Japanese draft horses
Archives of Virology. 159(12), p.3329-3334 (2014)

Okura,M., Lachance,C., Osaki,M., Sekizaki,T., Maruyama,F., Nozawa,T., Nakagawa,I., Hamada,S., Rossignol,C., Gottschalk,M., Takamatsu,D.
Development of a two-step multiplex PCR assay for typing of capsular polysaccharide synthesis gene *clusters of Streptococcus* suis
Journal of Clinical Microbiology. 52(5), p.1714-1719 (2014)

Ohkura,T., Minakuchi,M., Sagai,M., Kokuho,T., Konishi,M., Kameyama,K., Takeuchi,K.
Infection of the upper respiratory tract of hamsters by the bovine parainfluenza virus type 3 BN-1 strain expressing enhanced green fluorescent protein
Virology. 476, p.134-140 (2015)

Ohura,T., Sakakibara,H., Watanabe,I., Shim,W.J., Manage,P.M., Guruge,K.S.
Spatial and vertical distributions of sedimentary halogenated polycyclic aromatic hydrocarbons in moderately polluted areas of Asia
Environmental Pollution. 196, p.331-340 (2015)

Onozato,H., Fukai,K., Kitano,R., Yamazoe,R., Morioka,K., Yamada,M., Ohashi,S., Yoshida,K., Kanno,T.
Experimental infection of cattle and goats with a foot-and-mouth disease virus isolate from the 2010 epidemic in Japan
Archives of Virology. 159(11), p.2901-2908 (2014)

Sakagami,N., Nishida,K., Akiyama,K., Abe,H., Hoshi,H., Suzuki,C., Yoshioka,K.
Relationships between oxygen consumption rate, viability and subsequent development of in vivo-derived porcine embryos
Theriogenology. 83(1) p.14-20 (2015)

Sakaguchi,S., Nakagawa,S., Yoshikawa,R., Kuwahara,C., Hagiwara,H., Asai,K., Kawakami,K., Yamamoto,Y., Ogawa,M., Miyazawa,T.
Genetic diversity of feline morbilliviruses isolated in Japan.
Journal of General Virology. 95, p.1464-1468 (2014)

Sakai-Tagawa,Y., Ozawa,M., Yamada,S., Uchida,Y., Saito,T., Takahashi,K., Sugaya,N., Tashiro,M., Kawaoka,Y.
Detection sensitivity of influenza rapid diagnostic tests
Microbiology and Immunology. 58(10), p.600-606 (2014)

Sakakibara H., Ohura T., Kamiya Y., Yamanaka N., Shimada N., Shimoi K., Guruge K.S.
Sex-dependent difference in the hepatic and pulmonary toxicological effects in mice administrated 7-chlorinated benz[a]anthracene
Fundamental Toxicological Sciences. 1(3), p.101-108 (2014)

Sakurai,M., Suzuki,C., Yoshioka,K.
Effect of knockout serum replacement supplementation to culture medium on porcine blastocyst development and piglet production
Theriogenology. 83(4) p.679-686 (2015)

Sato,A., Kameyama,K., Nagai,M., Tateishi,K., Ohmori,K., Todaka,R., Katayama, K., Mizutani,T., Yamakawa,M., Shirai,J.
Complete Genome Sequence of Bovine Viral Diarrhea Virus 2 Japanese Reference and Vaccine Strain KZ-91CP
Genome Announcements. 3(1), e01573-14 (2015)

Suzuki,T., Hasebe,A., Miyazaki,A., Tsunemitsu,H.
Analysis of genetic divergence among strains of porcine rotavirus C, with focus on VP4 and VP7 genotypes in Japan
Virus Research. 197, p.26-34 (2015)

Suzuki,T., Hasebe,A., Miyazaki,A., Tsunemitsu,H.
Phylogenetic characterization of VP6 gene (inner capsid) of porcine rotavirus C collected in Japan
Infection, Genetics and Evolution. 26, p.223-227 (2014)

Suzuki,Y., Uchida,Y., Tanikawa,T., Maeda,N., Takemae,N., Saito,T.
Amino acid substitutions in PB1 of avian influenza viruses influence pathogenicity and transmissibility in chickens
Journal of Virology. 88(19), p.11130-11139 (2014)

Tagawa,Y.
Isolation and characterization of flagellar filaments from Bacillus cereus ATCC 14579.
Antonie van Leeuwenhoek International Journal of General and Molecular Microbiology. 106 (6), p.1157-1165 (2014)

Takamatsu,D., Morinishi,K., Arai,R., Sakamoto,A., Okura,M., Osaki,M.
Typing of *Melissococcus plutonius* isolated from European and Japanese honeybees suggests spread of sequence types across borders and between different *Apis* species.
Veterinary Microbiology. 171(1-2), p.221-226 (2014)

Thongkamkoon,P., Narongsak,W., Kobayashi,H., Pathanasophon,P., Kishima,M., Yamamoto,K.
In Vitro antimicrobial susceptibility of *Mycoplasma hyosynoviae* field isolates in Thailand during 2008-2011
The Japanese Journal of Animal Hygiene. 40(1), p.1-6 (2014)

Tsunekuni,R., Hikono,H., Saito,T.
Evaluation of avian paramyxovirus serotypes 2 to 10 as vaccine vectors in chickens previously immunized against Newcastle disease virus
Veterinary Immunology and Immunopathology. 160(3-4), p.184-191 (2014)

Sekizuka,T., Lee,K., Kuroda,M., Kusumoto,M., Iwata,T., Uchida,I., Tanaka,K., Tamamura,Y., Akiba,M.
Whole genome sequence of CMY-2 β-lactamase-producing *Salmonella enterica* serovar Typhimurium strain L-3553
Genome Announcements. 2(4):e00711-14 (2014)

Uchida,Y., Takemae,N., Saito,T.
Application of reverse genetics for producing attenuated vaccine strains against highly pathogenic avian influenza viruses
Journal of Veterinary Medical Science. 76(8) p.1111-1117 (2014)

Uchiyama,K., Miyata,H., Yano,M., Yamaguchi,Y., Imamura,M., Muramatsu,N., Das N.R., Chida,J., Hara,H., Sakaguchi,S.
Mouse-hamster chimeric prion protein (PrP) devoid of N-terminal residues 23-88 restores susceptibility to 22L prions, but not to RML prions in PrP-knockout mice
PLoS ONE. 16;9(10), e109737 (2014)

Uegaki,R., Tohno,M., Yamamura,K., Tsukiboshi,T.
Changes in the Concentration of Fumonisins in Forage Rice during the Growing Period, Differences among Cultivars and Sites, and Identification of the Causal Fungus
Journal of Agricultural and Food Chemistry 62(15), p.3356-3362 (2014)

Uegaki,R., Tohno,M., Yamamura,K., Tsukiboshi,T., Uozumi,S.
Natural occurrence of mycotoxins in forage maize during crop growth in Japan: case study
Mycotoxin Research. 31(1), p.51-56 (2015)

Ueno,Y., Hoshinoo,K., Tagawa,Y.
Mutations in the major outer membrane protein gene from *Histophilus somni* by an allelic exchange method
Journal of Microbiological Methods. 106, p.83-92 (2014)

Usui,M., Uchida,I., Tamura,Y.
Selection of macrolideresistant *Campylobacter* in pigs treated with macrolides.
Veterinary Record. (2014)

Yamada,M., Miyazaki,A., Yamamoto,Y., Nakamura,K., Ito,M., Tsunemitsu,H., Narita, M.
Experimental teschovirus encephalomyelitis in gnotobiotic pigs
Journal of Comparative Pathology. 150(2-3), p.276-286 (2014)

Yamamoto,T., Yamamoto,T., Yoshida,K., Fuchinoue,S., Hayama,Y., Hidano,A., Tsutsui,T.
Effectiveness of a short training session for improving pipetting accuracy
Accreditation and Quality Assurance. 19, p.459-463 (2014)

OIE Reference Laboratory

Bovine spongiform encephalopathy

Dr. Takashi Yokoyama
National Agricultural Research Organization
National Institute of Animal Health
3-1-5 Kannondai
Tsukuba
Ibaraki 305-0856
JAPAN
Tel: +81-298 38 78 40 Fax: +81-298 38 83 32
Email: tyoko@affrc.go.jp

Classical swine fever

Dr Shunji Yamada
National Institute of Animal Health
Department of Exotic Diseases
6-20-1 Josui-Honcho
Kodaira
Tokyo 187-0022
JAPAN
Tel: +81-42 321 14 41 Fax: +81-42 325 51 22
Email: musasabi@affrc.go.jp

Equine infectious anaemia

Dr Makoto Yamakawa
National Institute of Animal Health
Viral Disease Section
3-1-5 Kannondai
Tsukuba
Ibaraki 305-0856
JAPAN
Tel: +81-29 838 78 41 Fax: +81-29 838 78 44
Email: yamato@affrc.go.jp

Rinderpest

Dr Kazuo Yoshida
National Reference Laboratory for Rinderpest
Exotic Disease Research Division
National Institute of Animal Health (NIAH)
National Agriculture and Food Research Organization
Josuihoncho 6-20-1
Kodaira
Tokyo, 187-0022
JAPAN
Tel: +81-42 321.1441 Fax: +81-42 325.5122
Email: yoshidak@affrc.go.jp

Swine influenza

Dr Takehiko Saito
Viral Disease and Epidemiology Research Division
National Institute of Animal Health
National Agriculture and Food Research Organization
Kannondai, Tsukuba, Ibaraki, 305-0856
JAPAN
Tel: +81-29 838.79.14 Fax: +81-29 838.79.14
Email: taksaito@affrc.go.jp

OIE Collaborating Centre

Diagnosis and Control of Prioritised Animal Diseases and Related Veterinary Products Assessment in Asia

- National Institute of Animal Health (NIAH), National Agriculture and Food Research Organization (NARO)

  3-1-5, Kannondai, Tsukuba, Ibaraki, 305-0856, JAPAN

- National Veterinary Assay Laboratory (NVAL), Ministry of Agriculture, Forestry and Fisheries (MAFF)

  1-15-1, Tokura, Kokubunji, Tokyo, 185-8511, JAPAN

Organisation Mondiale de la Santé Animale | World Organisation for Animal Health | Organización Mundial de Sanidad Animal

Director General

Our Ref.: KH/SB 30.193

Paris, 4 June 2015

Dr Toshiro Kawashima
Chief veterinary Officer
Animal Health Division
Ministry of Agriculture, Forestry and Fisheries.
1-2-1 Kasumigaseki
Chiyoda-ku
Tokyo, 100-8950
Japan
toshiro_kawashima@nm.maff.go.jp

Dear Dr Toshiro Kawashima,

It is my pleasure to inform you that at the 83rd OIE General Session (May 2015), the **High Containment Facilities of Exotic Diseases Research Station, National Institute of Animal Health** (category A) and the **Building for Safety Evaluation Research, Production Center for Biologicals, Building for Biologics Research and Development (storage), National Institute of Animal** (category B) were designated as approved for holding rinderpest virus containing material following the adoption of OIE Resolution No. 25 (appendix 1) by the OIE World Assembly of Delegates.

I would like to remind you of the process for designation and the Mandate for Rinderpest Holding Facilities which are described in Resolution No. 23 adopted in 2014 (appendix 2). To ensure that the **High Containment Facilities of Exotic Diseases Research Station, National Institute of Animal Health** and the **Building for Safety Evaluation Research, Production Center for Biologicals, Building for Biologics Research and Development (storage), National Institute of Animal** retain their designation it is most important that they continue to fully comply with the mandate. Any significant changes in management, infrastructure or the ability of the High Containment Facilities of Exotic Diseases Research Station, National Institute of Animal Health and the Building for Safety Evaluation Research, Production Center for Biologicals; Building for Biologics Research and Development (storage), National Institute of Animal to comply with this mandate must be immediately notified to the OIE.

I would thank you for your on-going efforts and for your contribution to ensuring continued global freedom from rinderpest.

Yours sincerely,

Dr Bernard Vallat

Encl.: Resolution No. 23 and Resolution No. 25

Cc: B. Evans, M. Eloit, D. Visser, K. Hamilton, K. Matsuo, S. Linnane, H. Kugita, B. Tekola

Diagnostic Services (2015)

1. MORBIDITY OF OFFICIAL DISEASES

Foot and Mouth Disease	Numbers	Heads	Result	
			Positive	Negative
2011	6	17	0	17
2012	1	4	0	4
2013	0	0	0	0
2014	0	0	0	0
2015	0	0	0	0

High Pathogenic Avian Influenza	Numbers	Heads	Result	
			HPAI	LPAI
2011	24	27	27	0
2012	0	0	0	0
2013	0	0	0	0
2014	6	26	25	1
2015	5	37	37	0

Transmissible Spongiform Encephalopathy Surveillance	Numbers	Heads	Result	
			Positive	Negative
2011	311	406	1	405
2012	298	376	0	376
2013	341	419	0	419
2014	319	424	0	424
2015	299	415	0	415

(4) Avian InfulenzaSurveillance

Avian Infulenza Surveillance (Feces of wild bird)	Numbers	Heads	Result	
			Positive	Negative
2011		8	0	8
2012	4	11	11*	0
2013	6	15	15*	0
2014	2	10	10*	0
2015	4	8	8*	0

*All LPAI

2. Other Diseases

Animal	2011		2012		2013		2014		2015	
Cattle	386	(95)	660	(77)	730	(84)	511	(75)	983	(159)
Pig/Wild Boar	538	(50)	699	(86)	786	(105)	1,002	(115)	690	(80)
Horse	14	(3)	6	(3)	2	(2)	26	(3)	2	(2)
Sheep/Goat	221	(15)	162	(16)	158	(9)	64	(13)	274	(12)
Deer	33	(2)	74	(1)	73	(3)	55	(2)	0	(0)
Poultry	42	(6)	129	(8)	66	(12)	55	(5)	216	(22)
Others	19	(13)	86	(31)	90	(12)	37	(11)	103	(30)
Total	1,253	(184)	1,816	(222)	1,905	(227)	1,750	(224)	2,268	(305)

Training programmes(2015)

(1) **Training courses on animal health**

Category		Venue	Number of trainees	Period (Days)	Program
Basic		Headquarters	48	2015.5.18～5.29 (12)	Trend of husbandry Animal health situation Basic theory
Advanced		Headquarters	39	2015.9.15～9.17 (3)	Trend of husbandry Animal health situation State-of-the-art theory
Special	Diagnosis	Headquarters Exotic Diseases Research Station Hokkaido Research Station Kyushu Research Station	35※	2015.5.13～12.4 (206)	Theory and practical training in viral, bacteriological, pathological and biochemical diagnosis
	Bovine diseases	Headquarters	45	2015.6.17～6.26 (10)	Theory and practical training in bovine health
	Swine diseases	Headquarters	39	2015.7.1～7.10 (10)	Theory and practical training in swine health
	Poultry diseases	Headquarters	44	2015.6.4～6.12 (9)	Theory and practical training in poultry health
	Foreign animal diseases	Headquarters	48	2015.9.1～9.4 (4)	Theory and practical training in foreign animal diseases
	Veterinary epidemiology	Headquarters	28	2015.9.28～10.9 (12)	Theory and practical training in veterinary epidemiology

※ : Special Diagnosis training course (Breakdown list)

	Virology	Bacteriology	Pathology	Biochemistry	Total
Headquarters	6	5	8	4	23
Exotic Diseases Research Station	3				3
Hokkaido Research Station	1	1	1		3
Kyushu Research Station	2	2	2		6
Total	12	8	11	4	35

(2) **Workshop on animal health**

Category	Venue	Number of trainees	Period (Days)
Virology	Headquarters	49	2015.10.13～10.16 (4)
Bacteriology	Headquarters	41	2015.10.20～10.23 (4)
Pathology	Headquarters	45	2015.10.27～10.30 (4)
Biochemistry	Headquarters	47	2015.11.10～11.13 (4)

International Cooperation (2011～2015)

1 Technical Cooperation Project

	Period	Project site	Program
Project on capacity Development of Animal Health Laboratory	2011.7.17 ～ 2015.7.16 (2011 : 3 experts) (2012 : 3 experts) (2013 : 4 experts) (2014 : 1 expert) (2015 : 1 expert)	Indonesia	Improved the capacity of veterinary diagnosis techniques
The Project for Establishment of Cryo-bank System for Vietnamese Native Pig Resources and Sustainable Production System to Conserve Bio-diversity	2015.5.5 ～ 2020.5.4 (2015 : 2 experts)	Vietnam	Protecting Rare Breeds of Pig with a Gene Bank System

2 JICA

(1) For the Group Training Course on Research on Veterinary Technology

2011.3.27 ～ 10.29 4 trainees (Indonesia(2), Mongolia, Zambia)
2012.3.29 ～ 10.26 7 trainees (Cambodia, Indonesia(2), Mongolial(2), Myanmar, Zambia)
2013.3.26 ～ 10.30 8 trainees (Afghanistan, Indonesia, Malaysia(2), Mongolial(3), Uganda)
2014.3.27 ～ 10.30 7 trainees (Afghanistan, Cambodia, Ghana, Indonesia, Mongolial(2), Uganda)
2015.3.29 ～ 10.30 8 trainees (Afghanistan, Ghana, Indonesia(2), Mongolial(3), Uganda)

(2) Veterinary Diagnosis for Paramedics (Indonesia)

2014.2.3 ～ 4.25 2 trainees
2015.1.19 ～ 4.10 2 trainees

(3) Polymerase Chain Reaction Technique Training (Pakistan)

2015.7.6 ～ 8.8 1 trainee

List of NIAH produced Biological Products for Animal Use

Product	Unit
Live attenuated rinderpest virus vaccine (prepared for the outbreak)	50mL (50 Heads)
FITC – conjugated antibody against Campylobacter fetus	1mL (33 Samples)
Campylobacter fetus antigen for vaginal mucus agglutination test	50mL (25 Samples)
Bacilus anthracis antiserum for Ascoli test	2mL (0.4×5A) (4 Samples/A)
Brucalla abortus antigen for serum agglutination test	20mL (80 Samples)
Brucalla abortus antigen for complement fixation test	5mL (500 Samples)
Johnin (PPD of Mycobacterium paratuberculosis) for skin test	5mL (50 Heads)
Mycobacterium paratuberculosis antigen for complement fixation test	1mL (100 Samples)
Avian tuberculin (PPD of Mycobacterium avium) for skin test	5mL (50 Heads)
Salmonella Pullorum antigen for rapid whole blood plate agglutination test	20mL (666 Samples)
Mycoplasma mycoides antigen for complement fixation test	10mL (20 Samples)
Salmonella Abortusequi antigen for rapid plate agglutination test	5mL (25 Samples)

Testing Laboratory

Accreditation Certificate

Accreditation No.RTL04210

Influenza and Prion Disease Research Center, National Institute of Animal Health, NARO

3-1-5 Kannondai, Tsukuba, Ibaraki, 305-0856 Japan

meets the following criteria. On the basis of this, Japan Accreditation Board (JAB) grants accreditation to the said testing laboratory.

Applicable accreditation criteria	:	JIS Q 17025:2005 (ISO/IEC 17025:2005)
Scope of accreditation	:	**Biological sciences testing** (As described in the appendix)
Premises covered by accreditation	:	As described in the appendix.
Expiry date of accreditation	:	January 31, 2020

This accreditation demonstrates technical competence for a defined scope and the operation of a laboratory quality management system.
The management system requirements in ISO/IEC 17025:2005 meet the principles of ISO 9001:2008 and are aligned with its pertinent requirements.

Initial accreditation January 19, 2016

T. Oda, Chairman
Laboratory Accreditation Committee

H. Kume, President
Japan Accreditation Board

Issue No. : RTL04210-20160119

Accreditation No.	RTL04210

Accreditation Certificate Appendix

Type of Laboratory	Testing Laboratory
Name of Laboratory	Influenza and Prion Disease Research Center, National Institute of Animal Health, NARO
Address	3-1-5 Kannondai, Tsukuba, Ibaraki, 305-0856 Japan

1) Premises on which testing activities are performed

Name of Premise	Influenza and Prion Disease Research Center, National Institute of Animal Health, NARO	
Address of Premise	Postal Code	305-0856
	Address	3-1-5 Kannondai, Tsukuba, Ibaraki, Japan
Testing service at permanent facilities or on site testing service		☑ Testing service at permanent facilities ☐ On site testing service

Scope of Accreditation

CODE OF CLASSIFICATION, MATERIALS OR PRODUCTS TESTED / TECHNIQUE USED	PROPERTIES MEASURED	TEST METHOD STANDARD / STANDARD OPERATING PROCEDURE
M32.A2.8/B1.3 allantoic fluid, Culture supernatant	Subtyping of haemagglutinin protein (influenza virus)	WHO manual on animal influenza diagnosis and surveillance Ch.E.(May 2002)/ HA subtyping of influenza A virus by hemagglutination inhibition assay (SOP)
(Note)		

Japan Accreditation Board

Questions From NARO

- For prevention of HPAI, do industries conduct surveillance on the parts where government or local government cannot cover in order to defend themselves?
- We heard that HPAIV of H7N9 type, which entered from the continent, has already infected humans in Taiwan.

① Do you have any cases that the virus infected poultry?

② Do you have any measures to prevent infection of HPAIV and LPAIV of H7N9 from human to poultry?

- Has H5HPAIV of 2012-13 North American type, which was existing before, disappeared?

Question 1

- 牧場端主動通報，儘早發現可疑案例，即時處置以降低疫情傳播的風險
- 提高禽場的生物安全規格，避免不同週齡雞隻混養、縮短雞隻出清時間，水禽避免與候鳥接觸
- 強化禽場基礎設施及生物安全操作，朝具有生物安全基礎防護之非開放式禽舍飼養，搭配門禁管制、人車消毒等軟體生物安全措施
- 依「防範家禽流行性感冒（H5、H7 亞型）緊急應變措施手冊」辦理防疫

Question 1

- 鴨隻應經檢驗禽流感陰性，始得上市屠宰。檢驗陰性者由中央畜產會4區家禽保健中心或家畜衛生試驗所發給檢驗報告，檢附該檢驗報告者始能上市屠宰，檢驗報告效期為14天。
- 加強禽蛋燻蒸證明之查核，加強家禽健康證明書及鴨場檢驗報告查驗。

Question 2

- 2017年高雄臺商病例為境外移入，1月25日返國->確診後隔離治療->追蹤接觸人員(共108人)->每日回報病例治療狀況予疾管署管制中心
- 2017年禽場案例無H7N9
- 衛生單位進行相關作業人員之健康監控：

（一） 對於作業人員或雞場人員有感染禽流感之虞時進行抗病毒藥之預防性投藥。

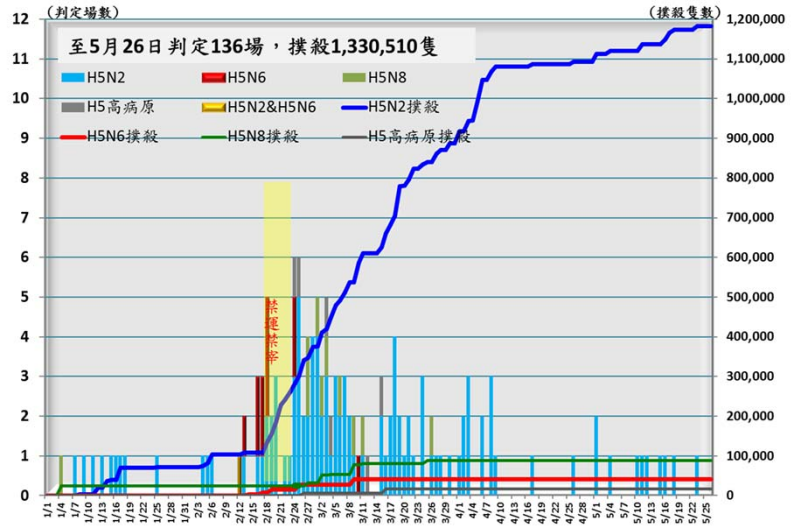
（二） 作業人員事前接種人流感疫苗，避免人禽流感病毒基因重組。

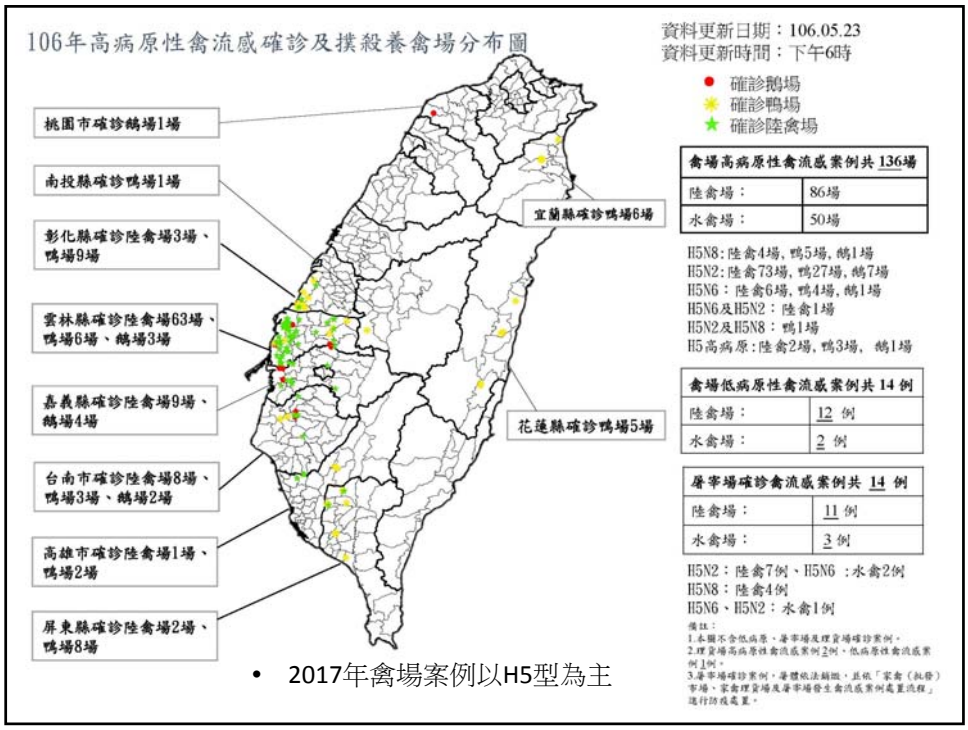
（三） 作業人員及其家人須進行自我健康管理，有流感症狀、呼吸道疾病或眼睛感染症狀者應主動通報衛生局(法定傳染病監視通報系統、傳染病問卷調查管理系統)

（四） 針對作業人員及動物防疫人員進行血清學調查

Question 3

106年家禽場禽流感判定場數及撲殺隻數





- 2017年禽場案例以H5型為主

Measures related to the disposal of avian influenza

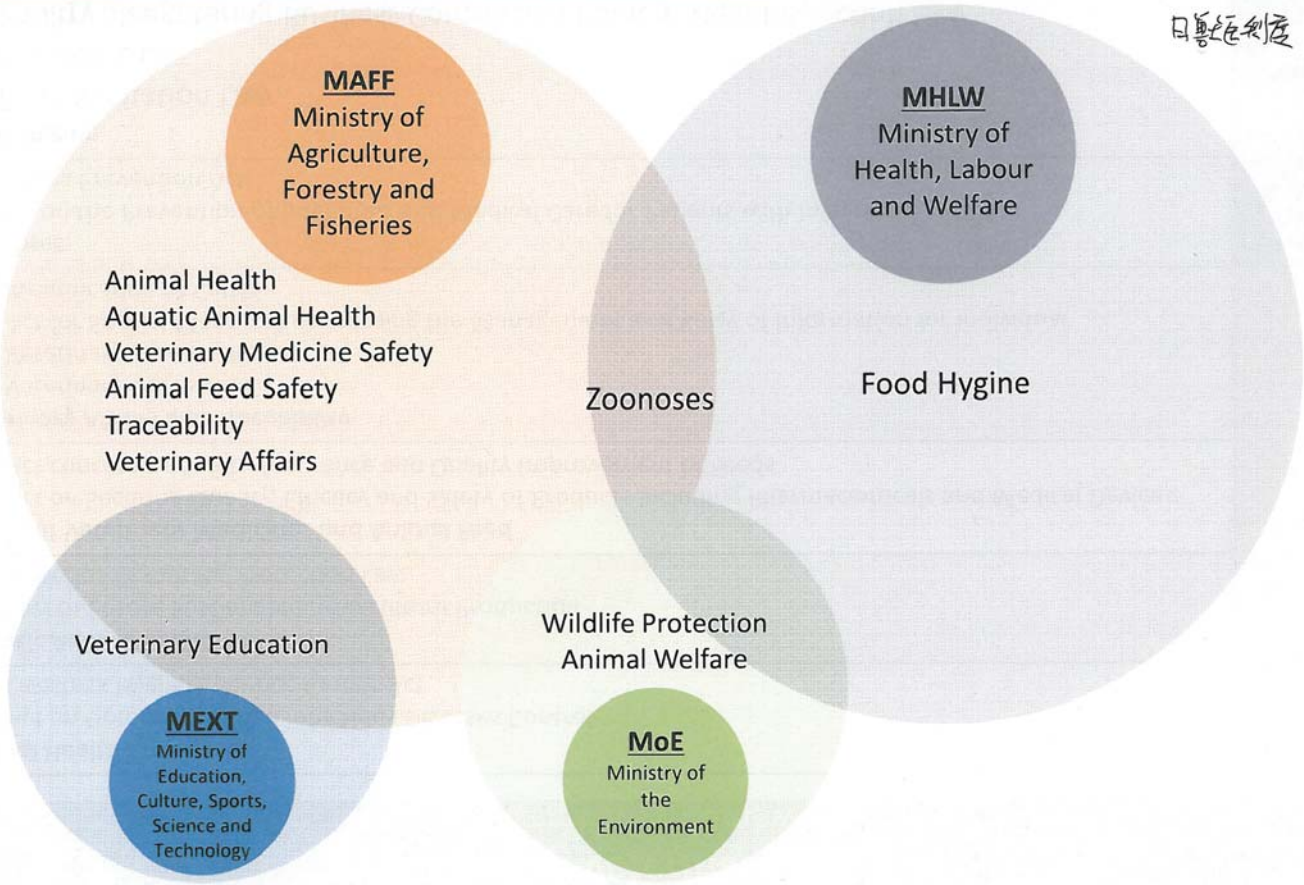
8th June 2017

Animal Health Division,
Food Safety and Consumer Affairs Bureau
Ministry of Agriculture, Forestry and Fisheries

Contents

Outline of Veterinary Services

- The role of government in veterinary services -



3

Outline of Veterinary Services

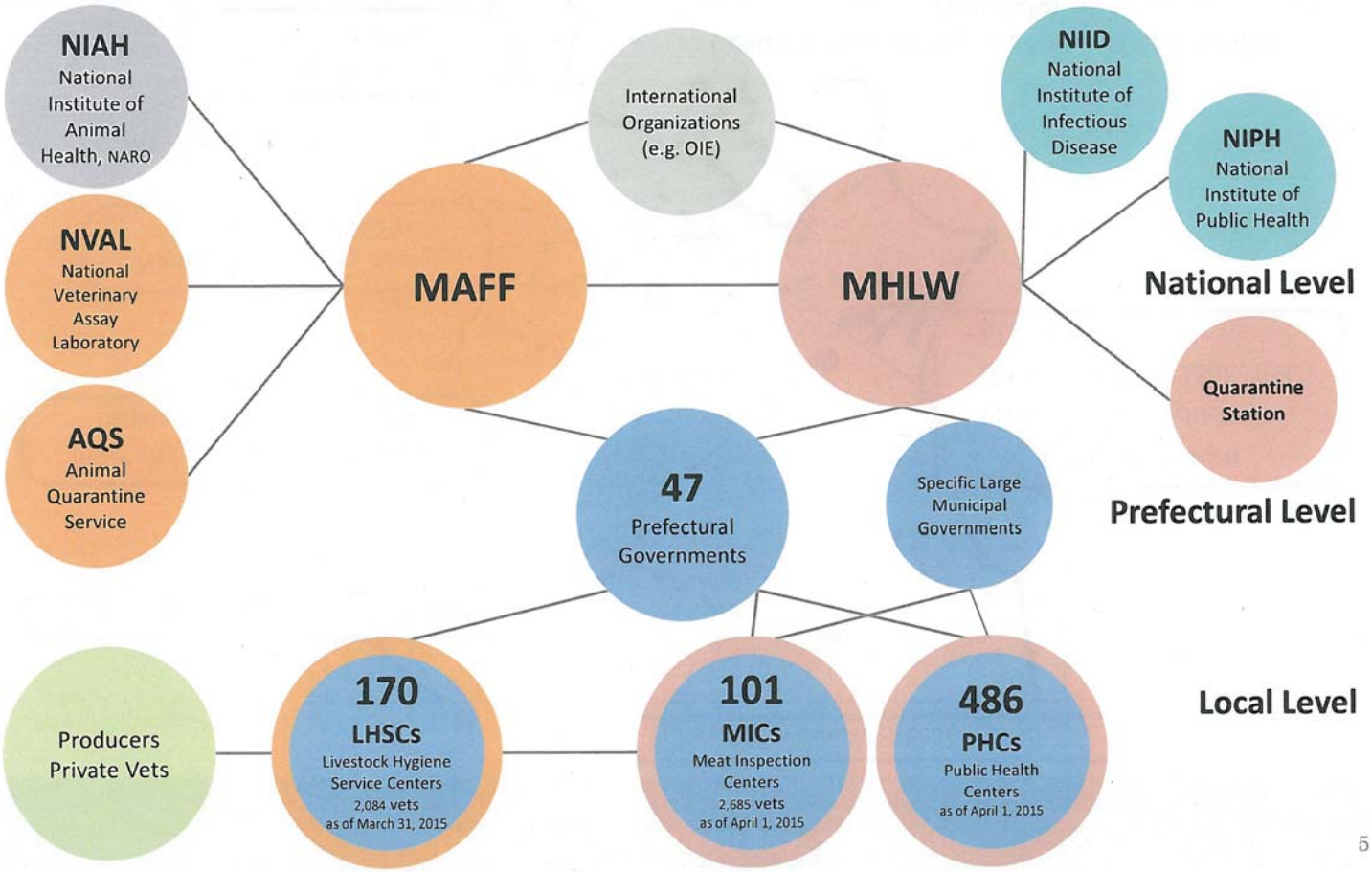
- Legislative framework -

Animal Health ● Act on Domestic Animal Infectious Diseases Control ● Livestock Hygiene Service Center Act	MAFF
Aquatic Animal Health ● Law to Ensure Sustainable Aquaculture Production ● Fisheries Resources Protection Law	
Safety of Veterinary Medicines and Animal Feed ● Act on Securing Quality, Efficacy and Safety of Products including Pharmaceuticals and Medical Devices ● Act concerning Safety Assurance and Quality Improvement of Feeds	
Veterinary Affairs and Traceability ● Veterinary License Act ● Veterinary Practice Act ● Act for Special Measures concerning the Management and Relay of Information for Individual Identification of Cattle	
Zoonoses ● Act on the Prevention of Infectious and Medical Care for Patients with Infections ● Rabies Prevention Act	MHLW and MAFF
Food Hygine ● Food Sanitation Law ● Abattoir Law ● Poultry Slaughtering Business Control and Poultry Meat Inspection Law	MHLW
Animal Welfare ● Act on Welfare and Management of Animals	MoE

4

Outline of Veterinary Services

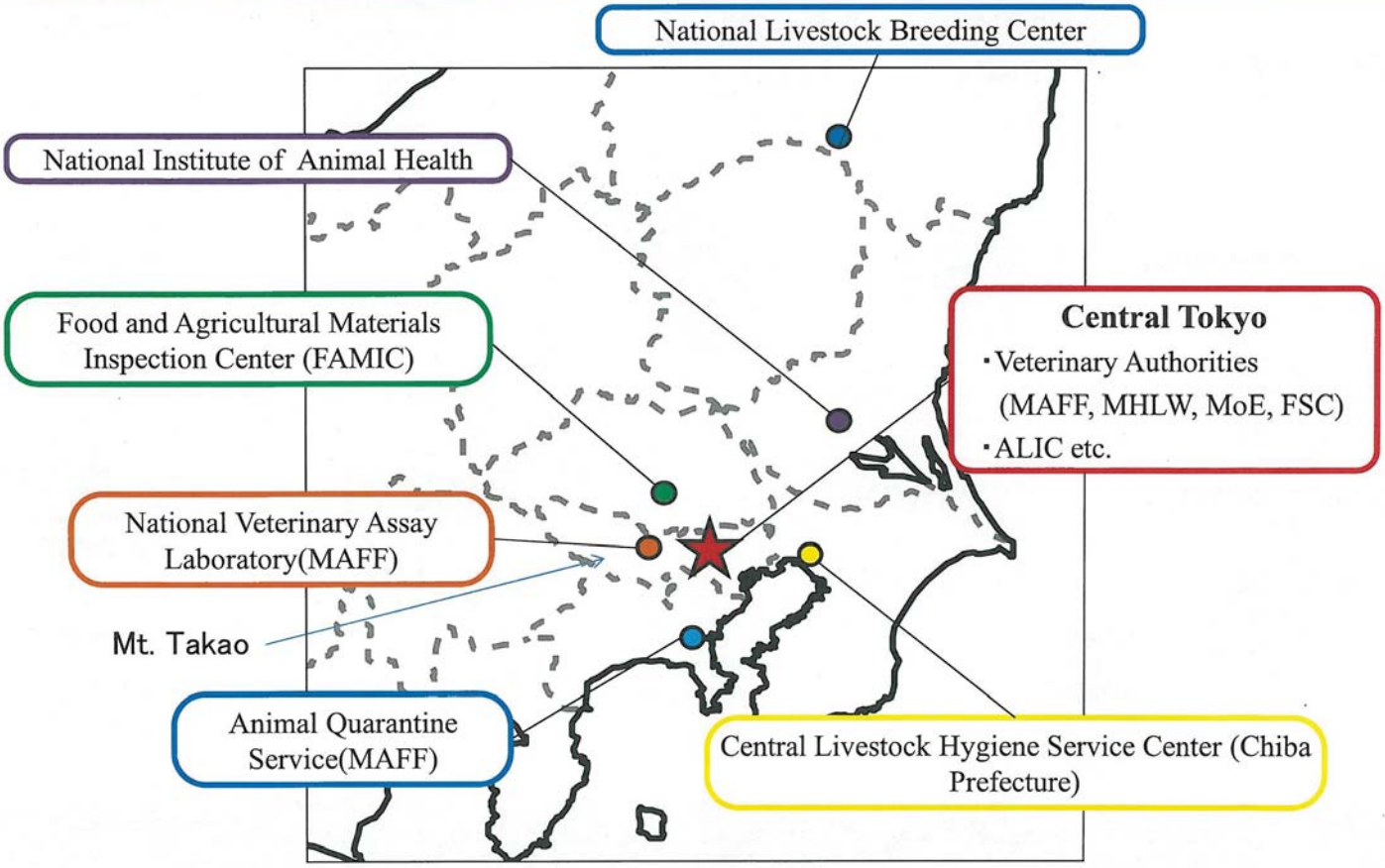
- Animal health and veterinary public health systems -



5

Outline of Veterinary Services

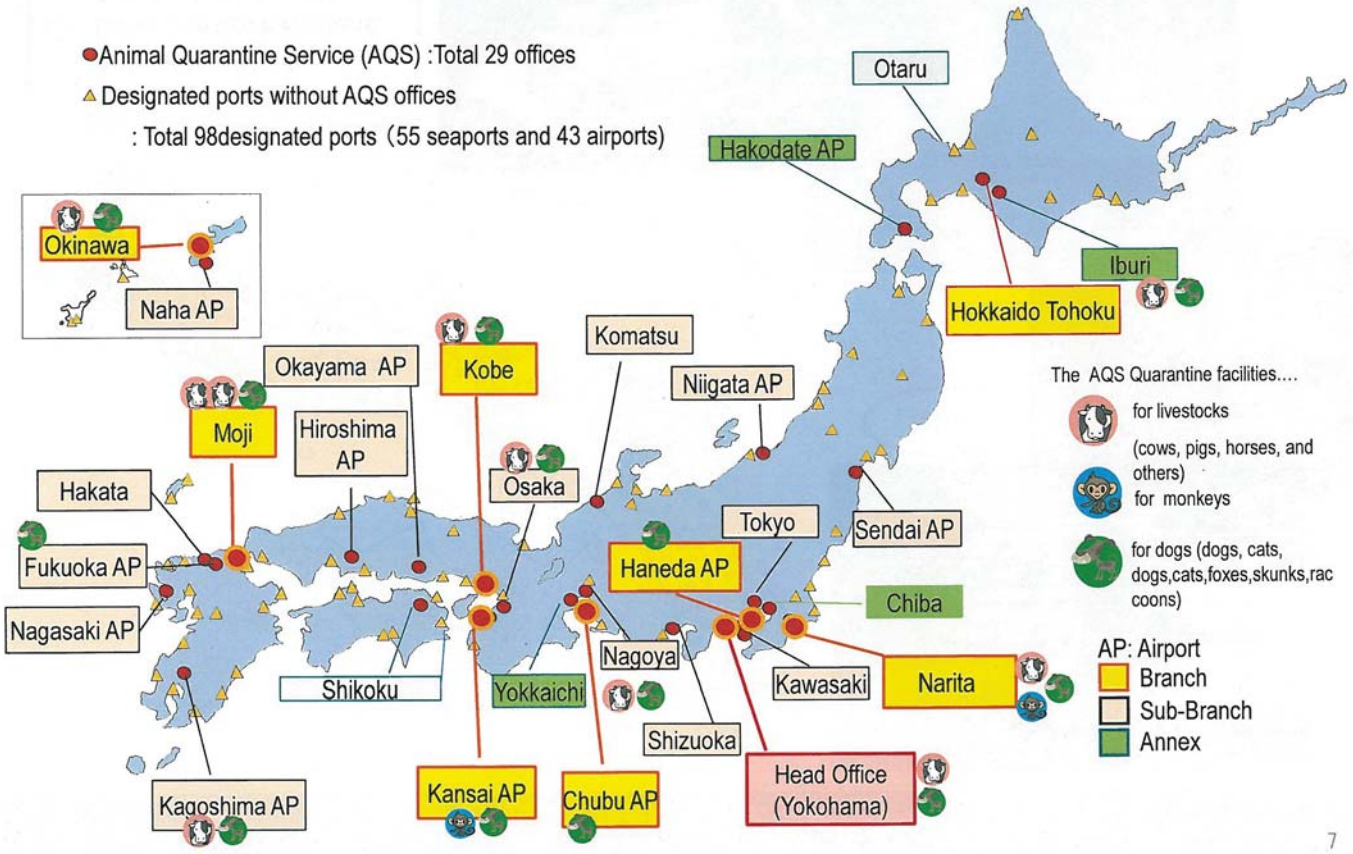
- Location of veterinary services-



6

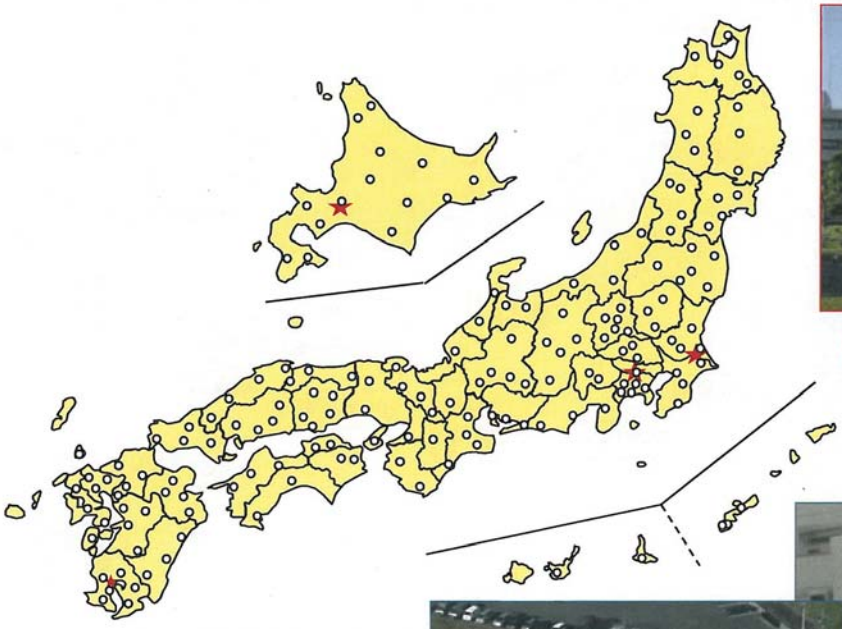
Outline of Veterinary Services

- Location of Animal Quarantine Stations and Designated Ports -



Outline of Veterinary Services

-Location of major facilities for animal health services-



★ National Institute of Animal Health: 4

○ Local Livestock Hygiene Service Centers: 170 (3/31/2016)

NIAH

Local Livestock Hygiene Service Centre

Outline of Veterinary Services
- Number of veterinarians in Japan -

Total: **39,098** (as of December 31, 2014)

Government Official: **9,526**

	Animal Health	Public Health	Educational fields	Environmental fields	Others
National Government Official	297	159	—	7	55
Prefectural Government Official	3,078	3,828	46	90	79
Municipal Government Official	128	1,531	4	36	188

Private Sector: **29,572**

Private organizations and corporations	Private practice			Others
	Farm animals	Cats and Dogs	Others	
7,855	1,664	15,205	140	4,708

9

- Outline of Veterinary Services in Japan
- Animal Health System in Japan
  - Measures related to the disposal of avian influenza
  - Epidemic prevention information propaganda
  - Epidemiological survey
  - Support
  - Others

10

Basic principle measures against Transboundary Animal Disease

1. Preparedness

- Awareness of farmers, related persons of industry, travelers
- Simulation exercises
- Vaccine stock for emergency use (FMD, CSF, HPAI)
- Prepare disease control materials (disinfectant, infection protective ware, equipment for culling, carrying vehicle etc.)

2. Prevention

- Impose strict biosecurity measures at farms
- Alerts on the outbreaks information
- Import control

3. Early response

- Monitoring the disease situation (active/passive surveillance)
- Early detection and reporting

4. Containment

- Culling of infected animals
- Disinfection
- Movement restrictions
- Testing animals at farms around affected farms
- Financial support

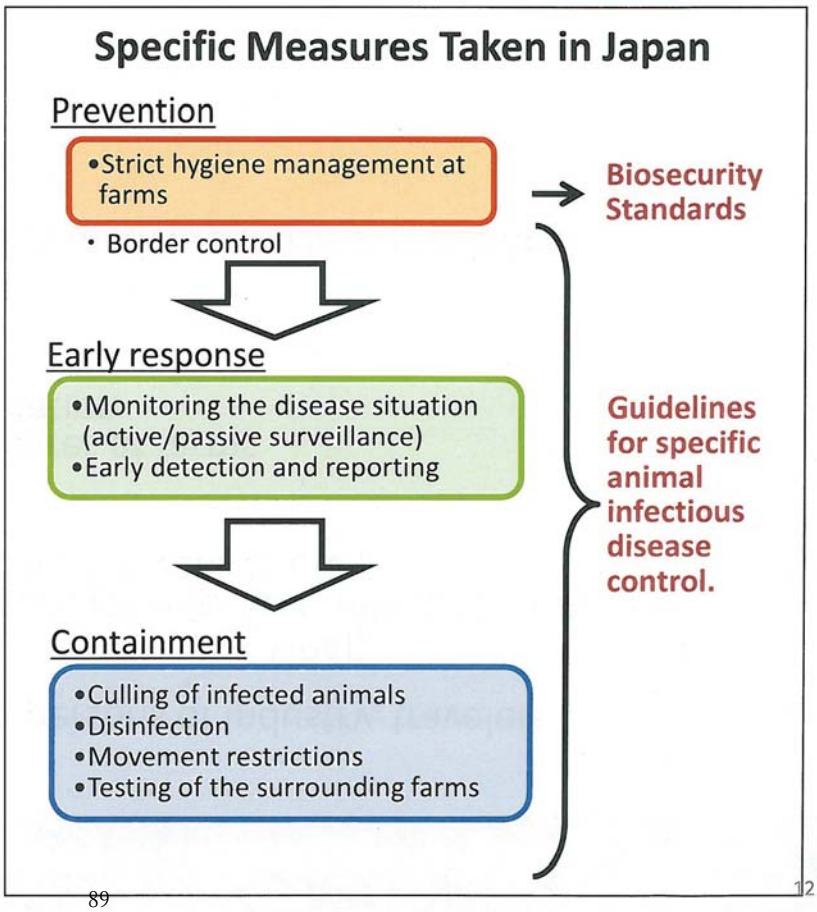
11

Domestic Animal Disease Control in Japan

(1) MAFF provides basic policy and guidance on animal disease control measures and supports prefectures to implement them.

(2) MAFF also encourages livestock farmers to implement strict biosecurity measures, monitors the disease situation (active/passive surveillance) and provides guidance on vaccinations.

(3) In case of disease occurrence, MAFF implements the culling of infected animals and puts in place necessary measures such as movement restrictions and testing.



12

Biosecurity standards

MAFF
Animal Health Division

- Establish standards of biosecurity measures (the Biosecurity Standards) to be followed by the livestock owners.

47
Prefectural Governments

- Conduct on-the-spot inspections at least once a year and hold seminars for them to maintain improve their awareness of Transboundary Animal Diseases (TADs, e.g. FMD, HPAI) control and to ensure the biosecurity standards followed.
- Give advice, recommendations and orders to those who do not follow the biosecurity standards

170
LHSC
Livestock Hygiene Service Centers
2,084 vets

Livestock owners

Beef cattle:	57,500 farms
Dairy cattle:	18,600 farms
Pigs:	5,270 farms
Layers:	2,560 farms
Broilers:	2,380 farms

13

Biosecurity Standards

14

Measures

Guideline for the Control of Specific Domestic Animal Infectious Diseases Caused by Highly Pathogenic Avian Influenza and Low Pathogenic Avian Influenza

September 9, 2015

Public Announcement of the Minister of Agriculture, Forestry and Fisheries

Basic policies

1 Critical measures for the control disease includes:
- Prevention of outbreak
- Early detection and notification
- Prompt and appropriate initial response

2 Strengthen border control
- Prevention the entry of viruses into Japan from other countries through travel and trade

3 Owners of poultry should comply with Biosecurity Standards
And when poultry suffer from symptoms suggesting HPAI or LPAI infection,
- Notify the prefecture immediately
- Administrative organs and the bodies make efforts toward prevention and to prepare for an outbreak

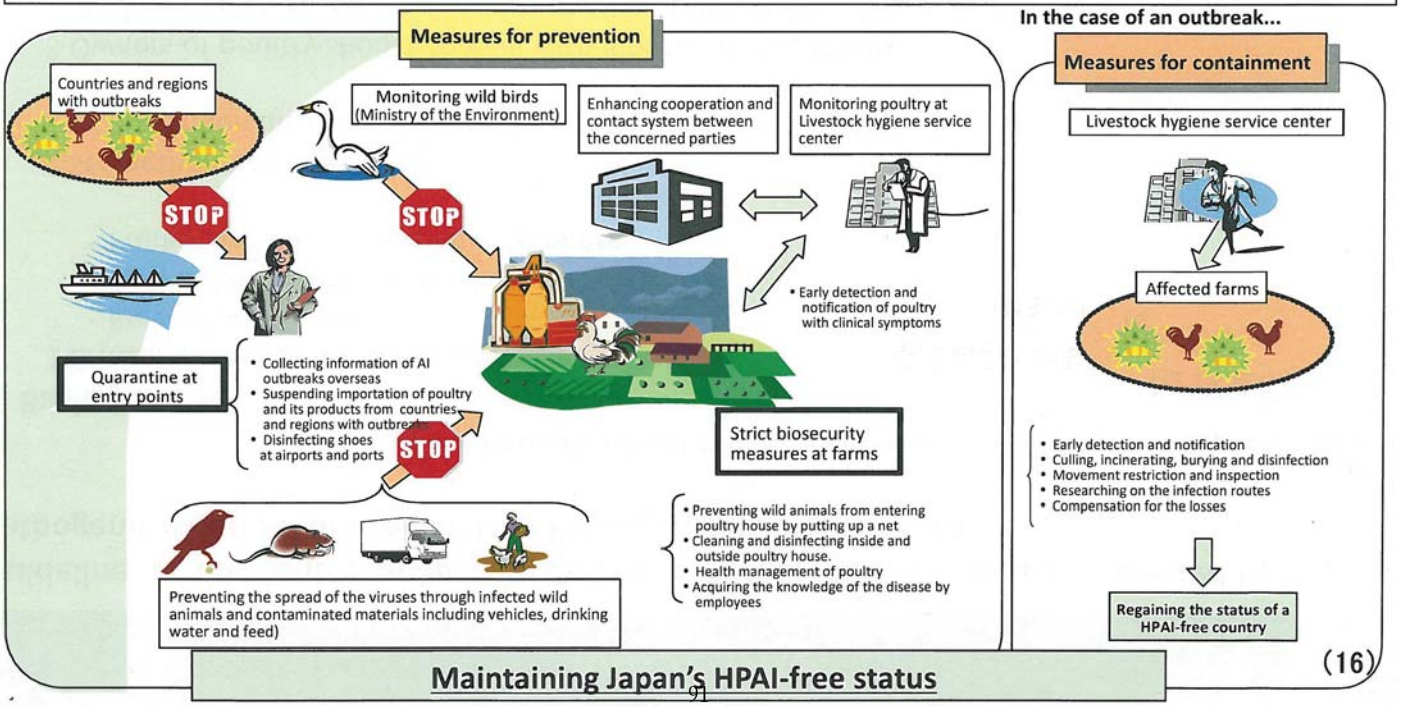
4 Appropriate initial response and Compensations
- Slaughter of affected animals
- Disposal of carcasses and disinfection of contaminated areas
- The cost of control measures shall be paid by the Government

} To prevent disease spread and control the situation at an early stage

15

Outline of Control Measures for HPAI and LPAI

- Collecting information of AI outbreaks overseas and enhancing quarantine system
- Monitoring poultry and wild birds
- Early detection and notification of poultry with clinical symptoms, and strict biosecurity measures at farms
- Improving crisis management system including disease simulation exercise and emergency response
- Preventing the spread of the disease by immediate culling and movement restriction



(16)

Key point of preventive measures

No exception of disinfection of vehicles which enter farm?

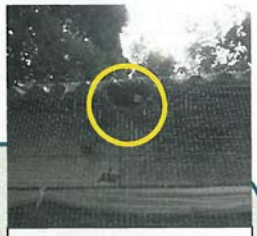
Outside of farm

Disinfection of vehicles

Installment of signs and gates

Inside of farm

No crack of wall and floor (CAUTION if crack of light is confirmed)



No break of bird net

No pathway from which small wild animals can invade into poultry house?

Measures to prevent invasion of small animals from drainage channel (Installment of iron bars)

No exception of disinfection of people and commodities (boots and clothes, etc.) that enter poultry house?

Poultry house

Installment of boot dips, Exchange of disinfectant
Change of clothes and boots

Clean up surrounding poultry house to prevent approach of wild animals

No trees and shrubs which can be resting place of birds and pathway of small animals

Measures to eliminate apertures of conveyors and belts (e.g. Cover the aperture when the conveyor is not used)

Clean up surrounding poultry house to prevent approach of wild animals?

Actions against HPAI outbreak following Guideline

- By FARM
- By prefectural animal health divisions/units
- By NIAH*
- By MAFF

*National Institute of Animal Health, National Agriculture and Food Research Organization, Independent, Administrative Institution

Notification from farmer

Entry to the farm

Clinical inspection, Rapid test, RT-PCR test

Gene sequencing etc.

Establishment of Task Force for HPAI control

Confirmation of affected or suspected animals,
Establishment of Movement restriction zone(3km) and Shipment restriction zone (10km) after consultation with MAFF

Within 24 hours

<affected farm>

-Slaughter
-Disposal of animal carcasses and contaminated goods
-Disinfection

Control measures completed

Surveillance for confirmation of freedom from HPAI
(The farms located at movement restriction zone)

Confirmation of freedom of HPAI
(Clinical Inspection, Laboratory test etc.

10days after completion of control measures

Surveillance for confirmation of freedom from HPAI
(The farms located at movement restriction zone)

Confirmation of freedom of HPAI
(Clinical Inspection, Laboratory test etc.

Lifting shipment restriction zone after consultation with MAFF

Confirmation of freedom of HPAI
(Clinical Inspection, Laboratory test etc.

21days after completion of control measures

Lifting movement restriction zone after consultation with MAFF

Instructions by Prime Minister（28th and 29th, November 2016）

（For Highly Pathogenic Avian Influenza incidents in Japan (2016-2017)）

- ○ Request poultry farmers to take every precautions against HPAI and give them appropriate technical advice on preventive measures against the disease.
- ○ Collect information from the affected sites intensively.
- ○ When suspicious case of HPAI is detected, MAFF and other relevant Ministries work closely and commence sufficient control measures promptly.
- ○ Provide accurate information on this issue with the public rapidly.

Past Outbreak HPAI Confirmed from 2004 to 2017

<Outbreaks in 2004> Subtype H5N1 (highly pathogenic)
Jan. **Yamaguchi** (about 30,000 birds at one farm)
Feb. **Oita** (14 birds at one premise)
Feb.-Mar. **Kyoto** (about 240,000 birds at two farms)
- In 2004, HPAI occurred. This was the first time in 79 years that it had occurred in Japan.
- The Act on Domestic Animal Infectious Diseases Control was revised and guidelines for specific animal infectious disease control were established.
- The Emergency Comprehensive Control Measures for Bird Flu was compiled.
- The animal disease control mutual fund was established and the management maintenance fund were established.
- Emergency vaccines were stocked.

<Outbreaks in 2007> Subtype H5N1 (highly pathogenic)
Jan. Miyazaki (about 70,000 birds at two farms)
Okayama (about 10,000 birds at one farm)
Feb. Miyazaki (about 90,000 birds at one farm)
Note: All movement restrictions were lifted on March 1, 2007.
- In February 2008, the disease control guidelines were revised (such as exceptional measures for poultry processing plants)
- Inspection of poultry farms, development and distribution of hygiene management guidance
- Strengthening monitoring and disseminating information in order to ensure early detection and reporting

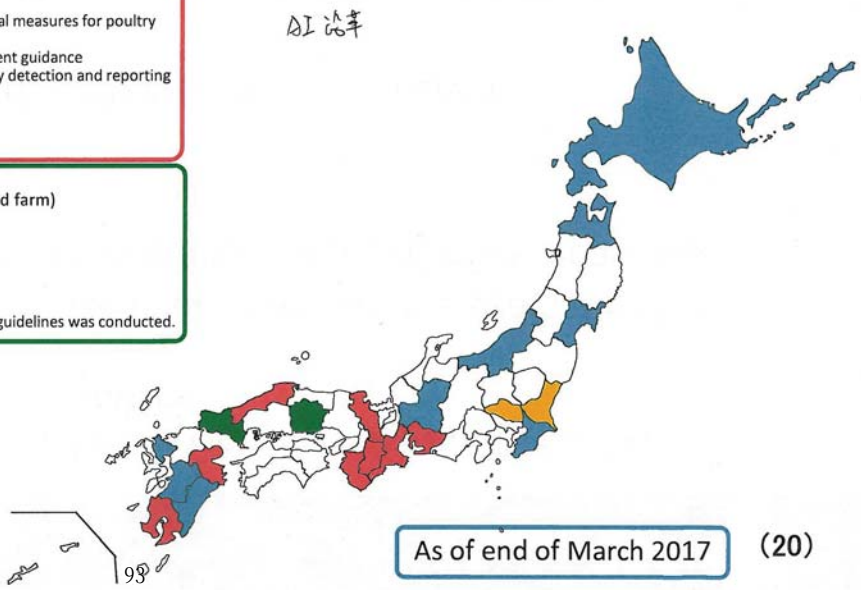
<Outbreaks in 2010 and 2011>Subtype H5N1 (highly pathogenic)
Nov-May 2011: **9 prefectures** (about 1.8 million birds in 24 farms)
For detailed information on outbreaks in 2010, please refer to next page.

<Outbreaks in 2014 and 2015> Subtype H5N8 (highly pathogenic)
Apr. **Kumamoto** (about 50,000 birds at one farm) (same measures to related farm)
Dec. **Miyazaki** (about 50,000 birds at two farms)
Yamaguchi (about 30,000 birds at one farm)
Jan 2015. Okayama (about 200,000 birds at one farm)
Saga (about 70,000 birds at one farm)
Note: All movement restrictions were lifted on February 14, 2015.
- Prompt disease control measures based on the animal infectious disease control guidelines was conducted.

<Outbreaks in 2016 and 2017> Subtype H5N6 (highly pathogenic)
Nov-Dec. **Aomori** (about 230,000 birds at two farms)
Niigata (about 550,000 birds at two farms)
Dec. **Hokkaido** (about 280,000 birds at one farm)
Kumamoto (about 92,000 birds at one farm)
Dec-Jan 2017. **Miyazaki** (about 290,000 birds at two farms)
Jan 2017. **Gifu** (about 81,000 birds at one farm)
Feb 2017. **Saga** (about 71,000 birds at one farm)
Mar 2017. **Miyagi**(about 220,000 birds at one farm)
Mar 2017. **Chiba**(about 62,000 birds at one farm)
Note: Movement restrictions have been set in Miyagi and Chiba.

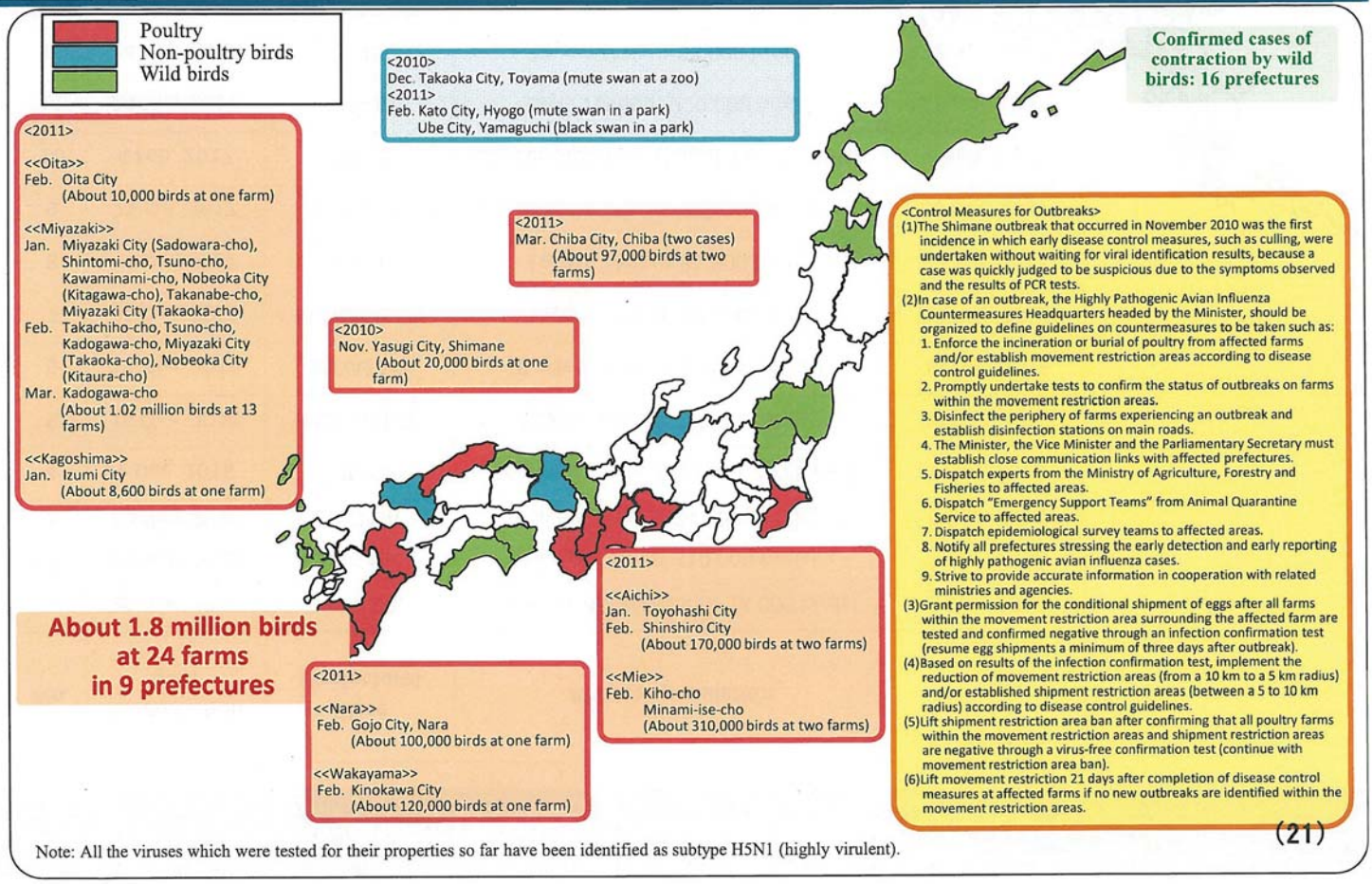
<Outbreaks in 2005> Subtype H5N2 (low pathogenic)
June-Jan 2006. **Ibaraki** and **Saitama** (about 5.78 million birds in 41 farms)
- Slaughtering completed by Apr. 2006.
- In light of the fact that it was a LPAI virus, special monitoring program was applied for farms which met specific conditions.
- In Dec. 2006, disease control measures for the occurrence of LPAI were added to the animal infectious disease control guidelines.

<Outbreaks in 2009> Subtype H7N6 (low pathogenic)
Feb.-Mar. **Aichi** (about 1.6 million birds at seven farms)
Note: All the movement restrictions were lifted on May 11, 2009.
- Inspection was conducted for all quail farms nationwide in order to make sure they were negative for the virus.
- Quails were added to the types of livestock subject to the animal disease control mutual fund in fiscal 2009.



As of end of March 2017

Past Outbreak HPAI Confirmed in FY2010



Note: All the viruses which were tested for their properties so far have been identified as subtype H5N1 (highly virulent).

HPAI (H5N6) confirmed in FY 2016

No.	Confirmation date	Place (Prefecture)	Affected population	Completion date of control measures
1	28 Nov, 2016	AOMORI	Domestic ducks (About 18,000 birds)	5 Dec. 2016
2	29 Nov. 2016	NIIGATA	Layers (About 310,000 birds)	5 Dec. 2016
3	30 Nov. 2016	NIIGATA	Layers (About 240,000 birds)	6 Dec. 2016
4	2 Dec. 2016	AOMORI	Domestic ducks (About 4,700 birds)	5 Dec. 2016
5	16 Dec. 2016	HOKKAIDO	Layers (About 280,000 birds)	24 Dec. 2016
6	19 Dec. 2016	MIYAZAKI	Broilers (About 120,000 birds)	21 Dec. 2016
7	27 Dec. 2016	KUMAMOTO	Layers (About 92,000 birds)	28 Dec. 2016
8	14 Jan. 2017	GIFU	Layers (About 81,000 birds)	17 Jan. 2017
9	24 Jan. 2017	MIYAZAKI	Broilers (About 170,000 birds)	26 Dec. 2017
10	4 Feb. 2017	SAGA	Broiler breeders (About 71,000 birds)	6 Feb. 2017
11	24 Mar 2017	MIYAGI	Layers (About 220,000 birds)	18 Apr. 2017
12	24 Mar 2017	CHIBA	Layers (About 68,000 birds)	18 Apr. 2017

Total: About 1.67 million birds

(As of 24 March, 2017)

Epidemic classification

Please see Handout

23

- Outline of Veterinary Services in Japan
- Animal Health System in Japan
  - Measures related to the disposal of avian influenza
  - Epidemic prevention information propaganda
  - Epidemiological survey
  - Support
  - Others

24

Education and training, epidemic prevention exercise

Exercise for TADs containment

- All prefectural governments implement desk-top simulation exercises, organized by MAFF.

- Local government conduct demonstration-type exercises.

Disinfection for human body

Disinfection for vehicle

Burying

25

Reporting business(1)

Response measures to be taken at the time of judgment confirming HPAI etc.

1 Reporting to the parties concerned

(1) After the poultry may be judged as affected or suspected of HPAI etc.

→The prefecture immediately notifies the following parties of the judgment and the location of the affected farm are confirmed by telephone, facsimile, etc.,.

a. The owner of the poultry concerned
b. The municipalities located in the relevant prefecture
c. The veterinary medical associations, producer/farmer groups and other bodies concerned located in the relevant prefecture
d. Local police, the Self-Defense Forces and other organizations concerned in the relevant prefecture
e. Adjacent prefectures

(2) According to (1) above, the prefecture also provides information, including the location of the farm where affected or suspected birds were confirmed, to farms located in the area within a 3-km radius of the farm concerned, and to parties that the prefecture recognizes as being necessity to notify.

* According to (2) above, the prefecture may provide information about an affected farm or may explain its policy of provision of information in advance. In this case, the prefecture should sufficiently explain the purpose of the provision of information to the parties concerned that receive the information. Thus, the prefecture provides the information concerned to prevent the spread of these diseases and provides strict instructions so that the parties concerned may not use the information for purposes other than the specified purpose or will not leak the information. To eliminate the risk of disorganized information release, the prefecture instructs them not to disclose the information concerned on the Internet.

26

Reporting business(2)

2 Announcement, etc. to the mass media

(1) MAFF makes a judgment regarding affected or suspected poultry
→Announces the details and future epidemic prevention policies to the mass media.

(2) In principle, the MAFF and the prefecture concerned simultaneously issue the announcement specified in **(1)** above.

(3) During issuance of the announcement specified in **(1)** above, accurate information should be provided regarding:
a. The risk of infection spread via humans, vehicles, etc.
b. Absence of reported human cases of infection resulting from eating poultry or eggs in Japan

(4) After sufficient consultation between the Animal Health Division and the prefectural animal health division/unit, the progress of control measures should be announced to the mass media, as needed.

(5) The mass media shall be asked to take a cooperative approach in the following manner:
a. Give full consideration to privacy protection
b. Do not access the affected farm and refrain from interfering in the measures implemented for epidemic

Reference: Guideline for the Control of Specific Domestic Animal Infectious Diseases Caused by Highly Pathogenic Avian Influenza and Low Pathogenic Avian Influenza

27

- Outline of Veterinary Services in Japan
- Animal Health System in Japan
  - Measures related to the disposal of avian influenza
  - Epidemic prevention information propaganda
  - Epidemiological survey
  - Support
  - Others

28

Epidemiological survey

Identification of the cause of an outbreak

1 MAFF,the prefecture(s) and NIAH

After confirmation of an outbreak of these diseases

→Launch comprehensive investigations of epidemiological information includings:

- Movement of
  - poultry
  - people (e.g., those in contact with poultry, such as poultry owners, farm employees, veterinarians, farming instructors and chicken catchers; and local government officials)
  - Vehicles (e.g., for poultry delivery, egg collection, feed delivery, carcass collection, excreta and manure delivery)
- Watering and feeding status
- Travel history of relevant personnel
- Movement of goods
- Migratory status of wild birds
- Wild terrestrial animals observed in the vicinity
- Weather conditions

2 The epidemiological investigation team consisting of relevant experts

- Provide required advice and instructions
- Help with prompt and accurate implementation of the investigation described in **1** above
- Analyze investigation results for possible causes of outbreak
- Organize the information and come up with a conclusion

Reference: Guideline for the Control of Specific Domestic Animal Infectious Diseases Caused by Highly Pathogenic Avian Influenza and Low Pathogenic Avian Influenza

29

Virus invasion path, virus information of HPAI in FY 2016

Invasion path

1. Invasion path into Japan

The virus is considered to be brought by the migratory birds.

The time of invasion might be earlier than that in the previous years.

The virus was invaded widely around Japan sea.

2. Invasion path into the chicken house

The invasion paths are unknown.

The farm near the pond, swamp or river had the higher risk for the viral invasion.

Virus Information

1. Genetics

The genetic analysis of the isolated virus suggested that the origin of the viruses found in Japan and Korean was common and at least 5 strains were invaded into Japan.

At least 4 strains that found in Japan were also detected in Korea.

2. Pathogenicity

The animal experiment suggested the pathogenicity of the virus strains (H5N6) were lower than that of the previous isolated H5N1.

30

- Outline of Veterinary Services in Japan
- Animal Health System in Japan
  - Measures related to the disposal of avian influenza
  - Epidemic prevention information propaganda
  - Epidemiological survey
  - Support
  - Others

31

Re-feeding qualification

Disinfection

The poultry house(s) etc. where affected or suspected birds were kept shall be disinfected more than 3 times at one week Intervals after completion of the slaughter in compliance with the standards specified in Article 30 of the Implementing Regulation of the Act on Domestic Animal Infectious Diseases Control (No. 35 Ordinance of the Ministry of Agriculture and Forestry, 1951).

Disinfection shall be carried out using sodium hypochlorite solution, alkali solution, formaldehyde, cresol liquid, invert soap liquid, and a high-temperature steam, etc.

Reference: Guideline for the Control of Specific Domestic Animal Infectious Diseases Caused by Highly Pathogenic Avian Influenza and Low Pathogenic Avian Influenza

32

Re-feeding qualification

Reintroduction of poultry

- After conducting disinfection the prefecture carry out the following inspections on all poultry houses on farms that are to reintroduce poultry. In this case, the prefecture shall strictly instruct the relevant farms to conduct a clinical inspection of their poultry on a daily basis after reintroduction and to immediately notify the Livestock hygiene service center of any abnormality, if present.
- A virus isolation test on the floors, walls, ceilings, etc. of each poultry house
- A clinical examination, a virus isolation test and a serum antibody test on the poultry that have been adopted to confirm disease-free status (hereinafter referred to as "sentinel birds")

Reference: Guideline for the Control of Specific Domestic Animal Infectious Diseases Caused by Highly Pathogenic Avian Influenza and Low Pathogenic Avian Influenza

33

Financial support, Livestock production and marketing support

Compensations

For rapid and effective control,

Compensations by MAFF for

- The loss incurred by stamping out (100%);
- Sales reduction (50%※) caused by movement restrictions

※: The rest of 50% is covered by local government

But in case of violation of the law,

➢ Reduced or no compensation for livestock owners who failed to take necessary preventive(strict hygiene management), promptly notify or cooperate to the control measures

34

Financial support, Livestock production and marketing support

	Compensation			Insurance (Mutual aid)
	Affected farms	Farms In the movement restricted area	Farms out of the movement restricted area	Affected farms
Subsidy	・Allowance for the culled animals (100%) ・For the cost of disposal (50%)	・For the economic loss and the increased cost due to the movement restriction (50%*) ※: The rest of 50% is covered by local government		・For the re-feeding ・For the sacrifice and the disposal of animals
Loan	・For the re-feeding ・For the maintenance of the business	・For the maintenance of the business	・For the maintenance of the business	

・For the cases of HPAI and FMD, the full amount of the valuation of the livestock is payed as the allowance.
・The allowance is not fully payed when the measure to prevent the spread has not been sufficiently carried.

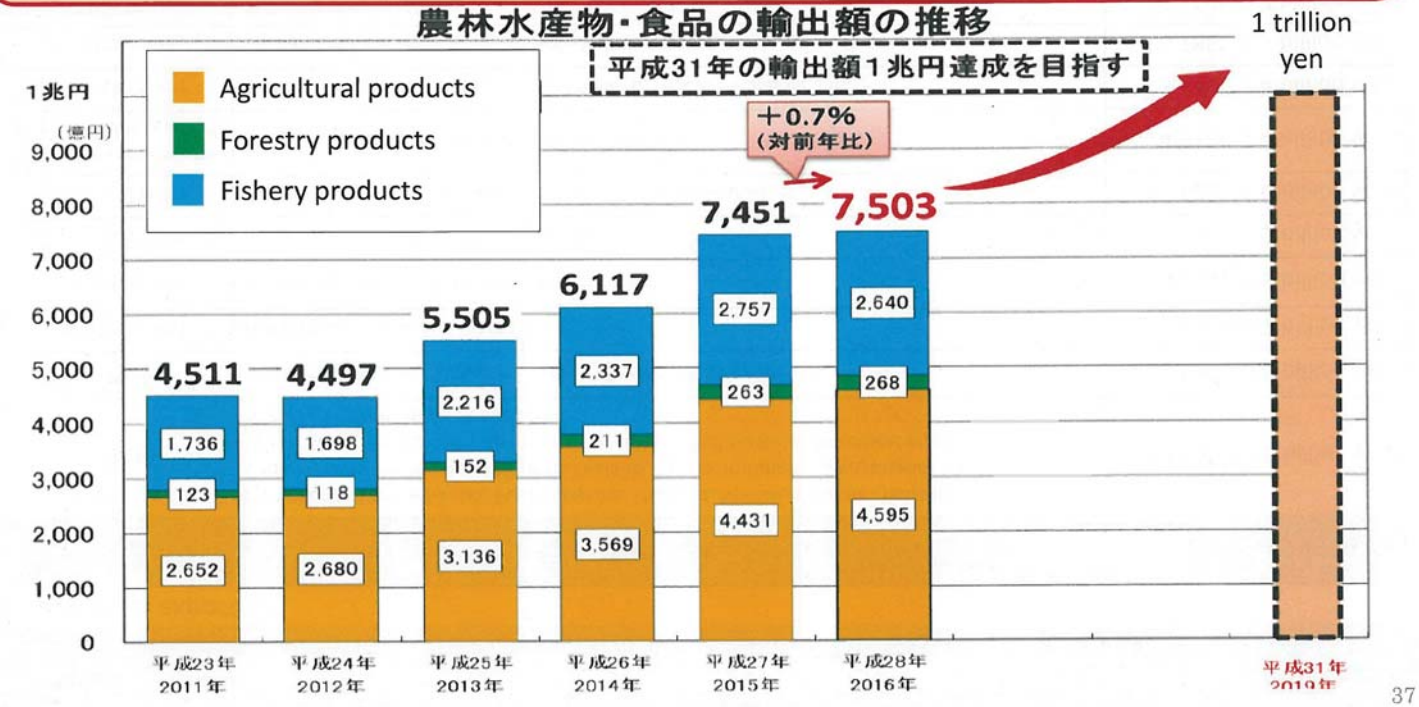
35

- Outline of Veterinary Services in Japan
- Animal Health System in Japan
  - Measures related to the disposal of avian influenza
  - Epidemic prevention information propaganda
  - Epidemiological survey
  - Support
  - Others

36

Strategy to Strengthen the Export Power of Agriculture, Forestry, and Fishery

- Export value of Japan has been increasing since 2013 and reached 750.3 billion yen in 2016.
- Promoting exports of agricultural, forestry, and fishery products toward the goal of achieving 1 trillion yen in the total export amount of agricultural, forestry, and fishery products and foodstuffs in 2019.



Export of livestock products from Japan

1. Japan can export to

Product		Countries and regions	Quantity of trade (2016)
Beef		Hong Kong, Cambodia, US, EU, Singapore, Thailand, Macau, Vietnam, Tadzhikistan, Mongolia, Canada, Laos, Philippine, UAE, New Zealand, Russia, Indonesia, Switzerland, Mexico, Myanmar, Qatar, Brazil, Bangladesh, Australia (heat-treated shelf-stable retorted beef products)※1, Bahrain, Norway, Liechtenstein, Belarus, etc.	1,909t (13.6 billion yen)
Pork		Hong Kong, Macau, Singapore, Taiwan, Cambodia, Vietnam, etc.	1,658t (0.9 billion yen)
Poultry meat※2		Hong Kong, Cambodia, Vietnam, etc.	9,051t (1.7 billion yen)
Shell eggs※2		Hong Kong, Taiwan, Indonesia, Singapore, etc.	3,244t (0.9 billion yen)
Milk product	Long Life Milk	Hong Kong, Taiwan, Thailand, Singapore, Korea, etc.	3,986t (0.9 billion yen)
	Cheese	Taiwan, Hong Kong, Thailand, Vietnam, US, Korea, Macau, etc.	629t (1.0 billion yen)
	Powder milk for child care	Vietnam, Hong Kong, Taiwan, Pakistan, Macau, etc.	4,818t (7.4 billion yen)
	Ice cream	Taiwan, Hong Kong, Singapore, US, Thailand, Macau, Malaysia, etc.	3,874t (2.4 billion yen)
Cow hide		Thailand, Korea, Hong Kong, Taiwan, Vietnam, India, etc.	6,785t (1.3 billion yen)
Pig hide		Thailand, Taiwan, Korea, Hong Kong, Vietnam, Philippine, etc.	65,368t (9.7 billion yen)

※1 Excluded from the quantity of trade of beef.

MOF "Trade Statistics"

※2 Since the outbreaks of HPAI in November and December 2016, January and February 2017, Hong Kong, Singapore and Vietnam continue to import poultry products from Japan except Aomori, Niigata, Hokkaido, Miyazaki, Kumamoto, Gifu and Saga prefecture. Cambodia imports meat and poultry meat products which is distributed in Japan. And poultry products could not export to Taiwan from all over Japan.

2. Japan is now applying to export to

- ○Beef: Australia, China, Taiwan, Korea, Malaysia, Brunei, Turkey, Israel, Saudi Arabia, Kuwait, Lebanon, South Africa, Peru, Chile, Argentine, Uruguay
- ○Pork: EU, US, China, Korea, Thailand, Philippine, Mexico
- ○Poultry meat: EU, US, Russia, Macau, China, Taiwan, Korea, Mongolia, Singapore, Indonesia, Philippine, Malaysia, Bangladesh, Pakistan, UAE
- ○Shell eggs: EU, US, Russia, Macau, China, Taiwan, Korea, Indonesia, Philippine, Malaysia, Bangladesh, UAE
- ○Milk and daily products: EU, China ○Cow and pig hide : China

International Cooperation on Animal Health

- Strengthening cooperation with neighboring countries, for example, exchange of disease information such as HPAI and FMD
- Preventing a spread of TADs in East Asia in cooperation with neighboring countries to reduce invasion risk into Japan

Cooperation among Japan, China and Korea

Symposium on Prevention and Control of TADs in East Asia
- Share the information on epidemiology and disease control measures to prevent a spread of TADs such as FMD and AI in East Asia
- Hosted by Japan, China and Korea in rotation from 2011
- The 7th symposium (in 2017) will be held in Japan

Memorandum on Cooperation on Response against TADs
- Agricultural Ministers of Japan, China and Korea signed the Memorandum in the 2nd Trilateral Agricultural Minister's Meeting held in Tokyo on September 13th, 2015

Technical Meeting by Veterinary Officials
- Exchange the information about disease situation, prevention and control between Japan and Korea
- Nov 2015 in Korea, Jun 2016 in Tokyo etc.

MOU between National Veterinary Institutes
- National Institute of Animal Health, Japan
  ⇔ Animal and Plant Quarantine Agency, Korea (Oct 2012)
  ⇔ Lanzhou Veterinary Research Institute, China (Mar 2016)
  Harbin Veterinary Research Institute, China (Mar 2016)
- Promote cooperation in research on FMD and HPAI between the laboratories

Cooperation with EU countries

G7 Niigata Agriculture Ministers' Meeting Declaration (Apr 2016)
- Based on the Declaration, 1st G7 Chief Veterinary Officers Forum was held in Tokyo (Nov 2016)

G7 Ise-Shima Leaders' Declaration (May 2016)

Joint Statement between leaders
- Listing the cooperation in animal health field such as diseases and AMR in Joint Statement between leaders
- G7, EU, Denmark, Poland, Uruguay

Support through OIE

Prevention and Control of zoonosis in Asia
- Surveillance for avian influenza in wild birds and poultry

Capacity building of veterinary services in Asia-Pacific region
- Development of a roadmap for disease control
- Surveillance of high-priority diseases
- Promoting on information sharing

p37

以下のスライドは予備です（使用しません）。

41

Example of Early response

Capacity to control priority TADs
Example of immediate notification & rapid response

	Case 1 AOMORI-1	**Case 2** AOMORI-2	**Case 3** NIIGATA-1	**Case 4** NIIGATA-2	**Case 5** MIYAZAKI-1	**Case 6** MIYAZAKI-2
No. of birds	18,360	4,720	315,330	228,518	116,977	166,195
Type of farm	Domestic duck	Domestic duck	Layer	Layer	Broiler	Broiler
No. of chicken houses	9	3	24	10	11	10
No. of dead birds at affected house Day 0 (**at notification**) Day -1 Day -2	 18 5 10	 5 0 1	 130 8 5	 80 45 26	 112 48 33	 110 19 18
Timetable						
Notification Farmer → Prefecture	8:35 28/Nov	10:20 2/Dec	14:05 28/Nov	10:30 30/Nov	12:45 19/Dec	11:30 24/Jan
Diagnosis	11:15 28/Nov	13:35 2/Dec	15:40 28/Nov	12:45 30/Nov	17:20 19/Dec	15:30 24/Jan
Start of culling	0:25 29/Nov	22:55 2/Dec	4:30 29/Nov	1:50 1/Dec	3:00 20/Dec	0:35 25/Jan
Method of sacrifice	CO_2	CO_2	CO_2	CO_2	CO_2	CO_2
Method of disposal	Burial under the land	Burial under the land	Burial under the land	Burial under the land	Burial under the land	Burial under the land

42

Example of Early response

Capacity to control priority TADs

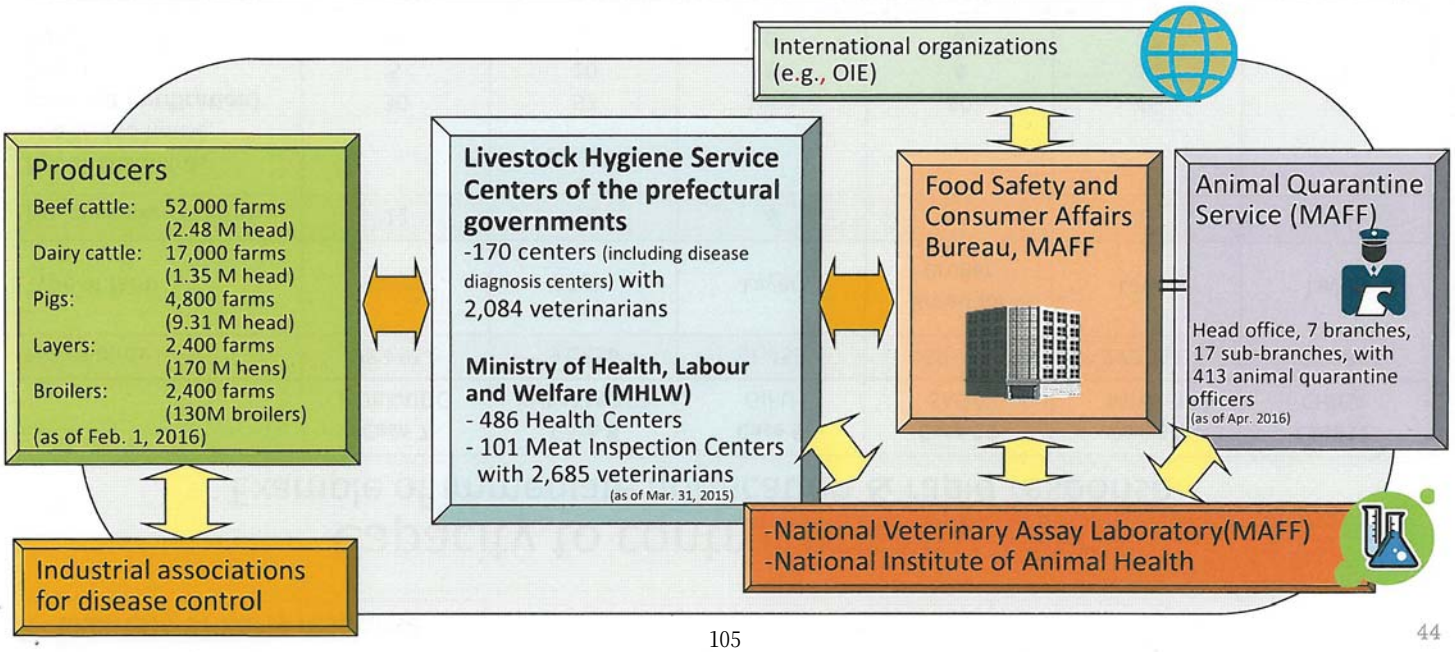
Example of immediate notification & rapid response

	Case 7 HOKKAIDO	**Case 8** KUMAMOTO	**Case 9** GIFU	**Case 10** SAGA	**Case11** MIYAGI	**Case12** CHIBA
No. of birds	283,952	91,856	81,459	68,761	222,290	63,385
Type of farm	Layer	Layer	Layer	Breed for Broiler	Layer	Layer
No. of chicken houses	22	11	8	10	8	3
No. of dead birds at affected house Day 0 (**at notification**) Day -1 Day -2	 30 5 4	 57 10 6	 100< 0 0	 40 4 8	 45 34 17	 26 78 14
Timetable						
Notification Farmer → Prefecture	10:00 16/Dec	16:40 26/Dec	8:23 14/Jan	10:00 4/Feb	13:55 23/Mar	17:00 23/Mar
Diagnosis	14:30 16/Dec	19:30 26/Dec	11:40 14/Jan	15:00 4/Feb	16:05 23/Mar	19:42 23/Mar
Start of culling	12:00 17/Dec	5:00 27/Dec	23:50 14/Jan	22:30 4/Feb	3:00 24/Mar	4:20 24/Mar
Method of sacrifice	CO_2	CO_2	CO_2	CO_2	CO_2	CO_2
Method of disposal	Burial under the land	Burial under the land	Burial under the land	Burial under the land	Burial under the land	Burial under the land

43

Animal Health System in Japan - Major players

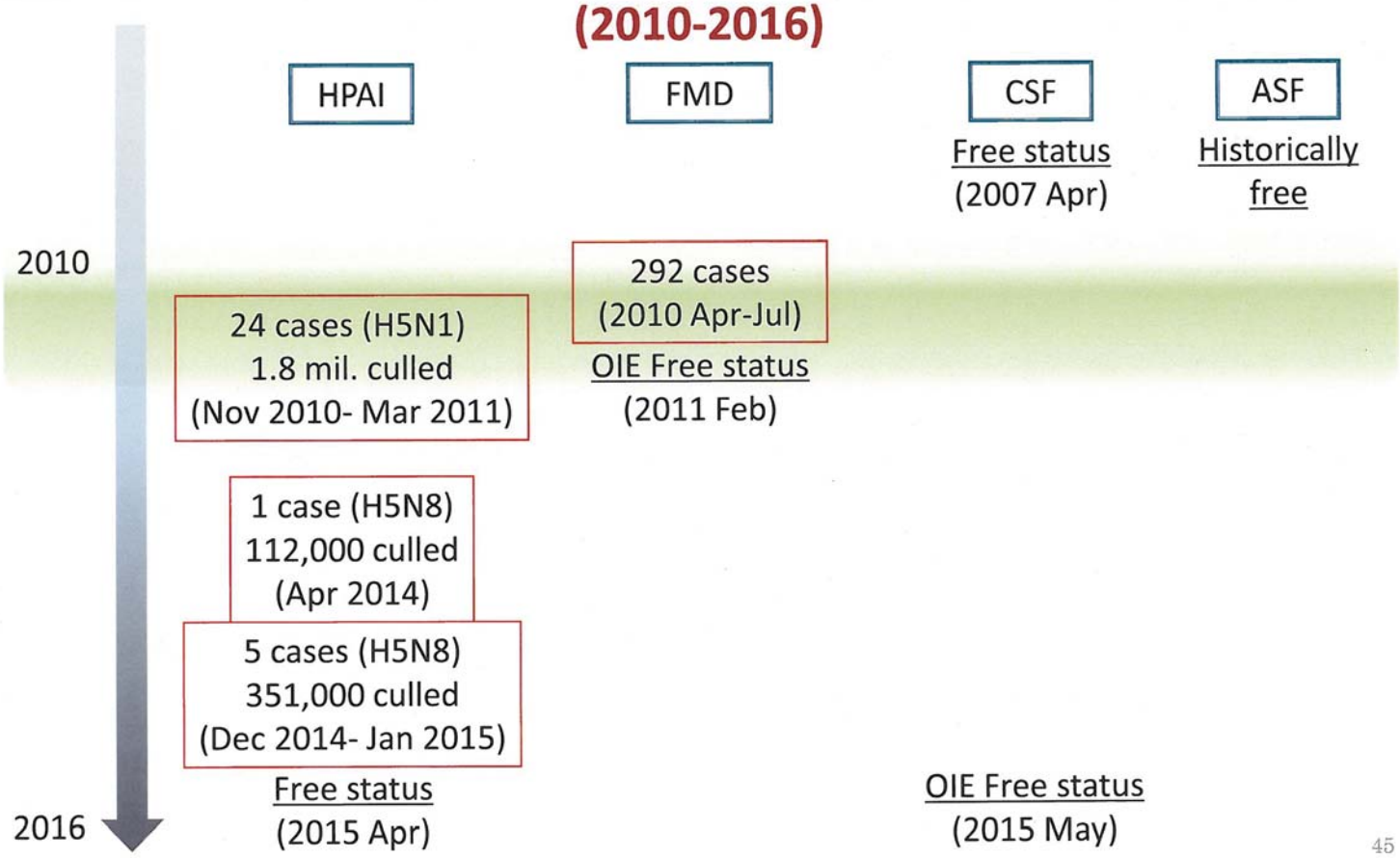
(1) The Ministry of Agriculture, Forestry and Fisheries (MAFF) provides basic policy and guidance on animal disease control measures in cooperation with prefectural governments, the National Institute of Animal Health and other relevant organizations. The Animal Quarantine Service, MAFF conducts import/export quarantine.
(2) Prefectural governments establish local veterinary service centers ("Livestock Hygiene Service Centers") as the front-line organizations to implement animal disease control measures. MAFF supports the activities of Livestock Hygiene Service Centers and organizes training for their veterinary staff.
(3) National and local livestock industry associations for animal disease control (e.g., Livestock and Livestock Products Hygiene Guidance Associations) encourage producers to take voluntary actions (e.g., vaccinations, disinfection).



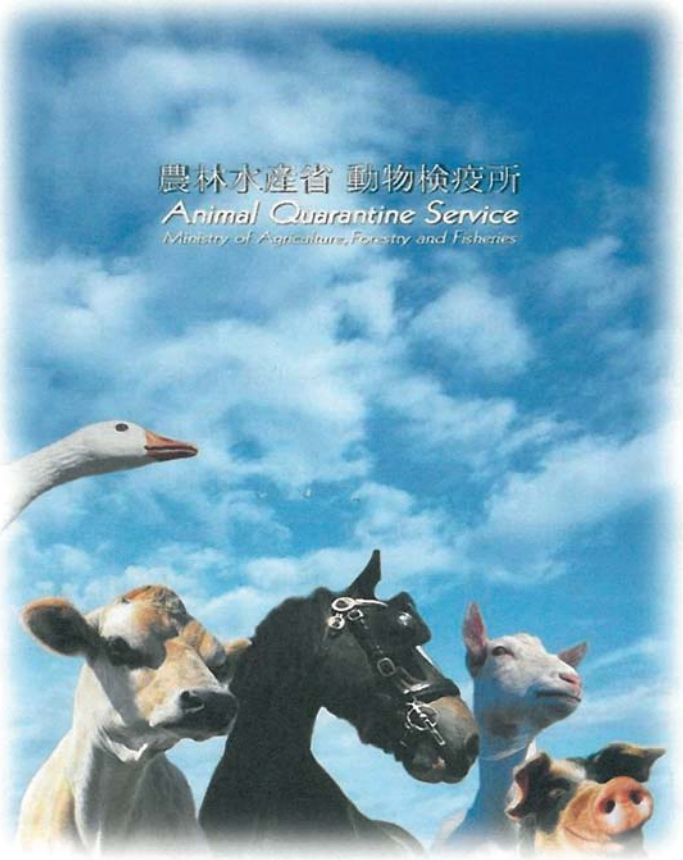
44

Recent Occurrence of Major TADs in Japan

(2010-2016)



45



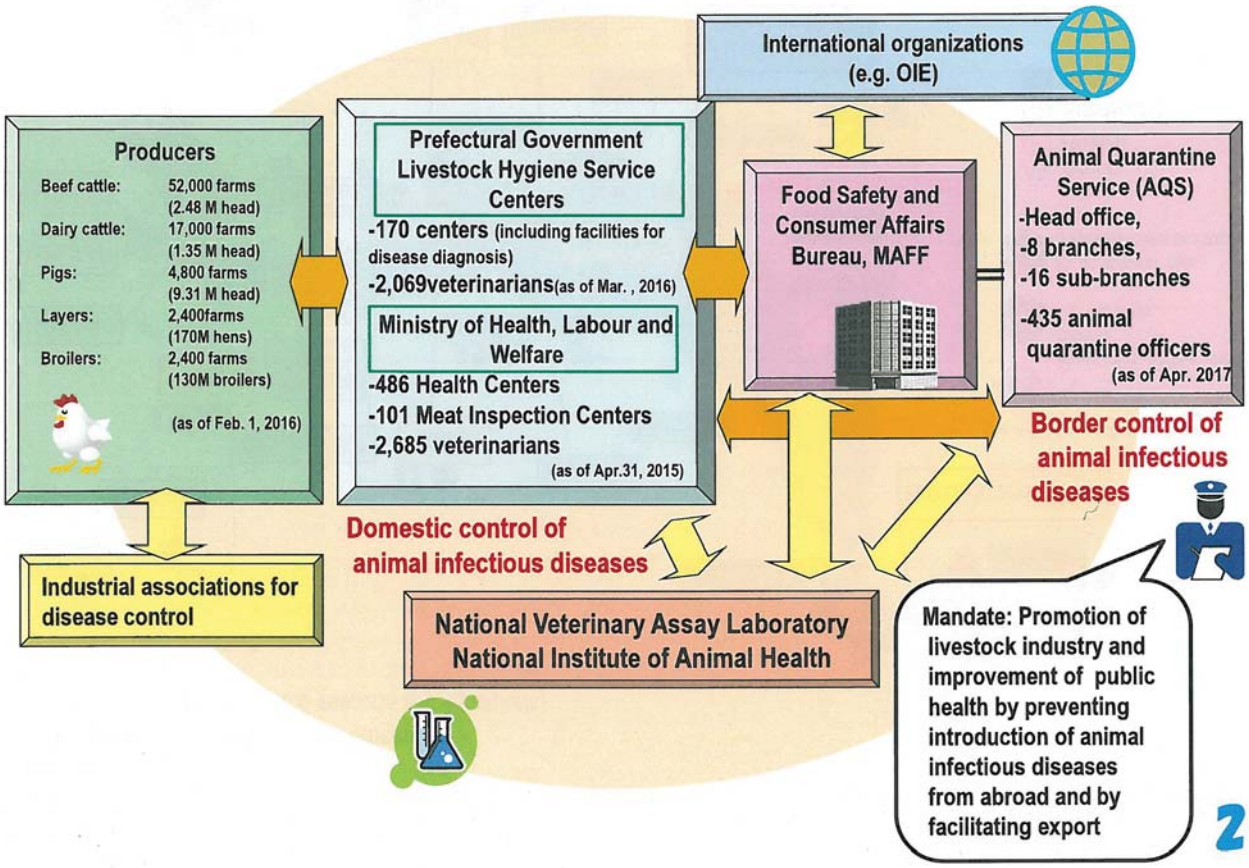
The Outline of Animal Quarantine Service

June 9, 2017

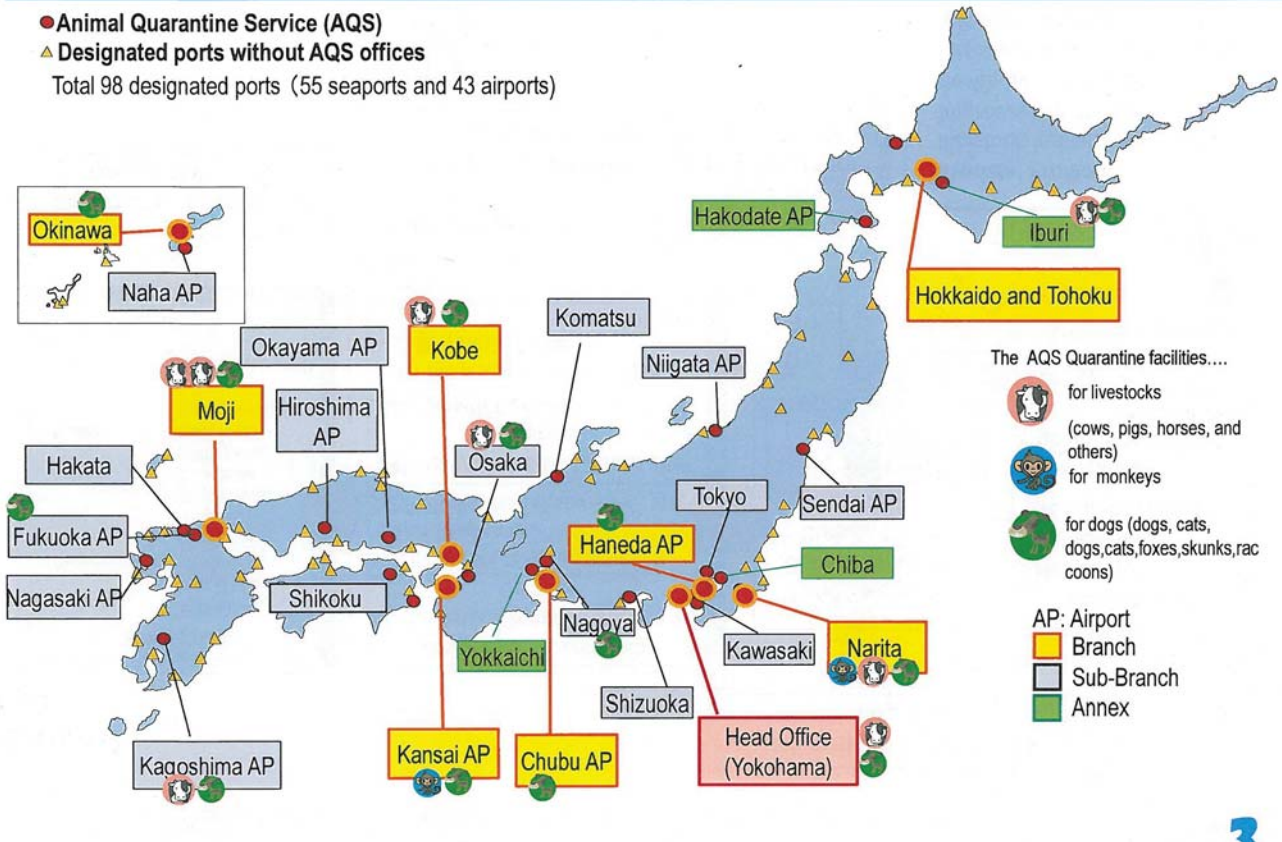
Animal Quarantine Service
MAFF

Contents

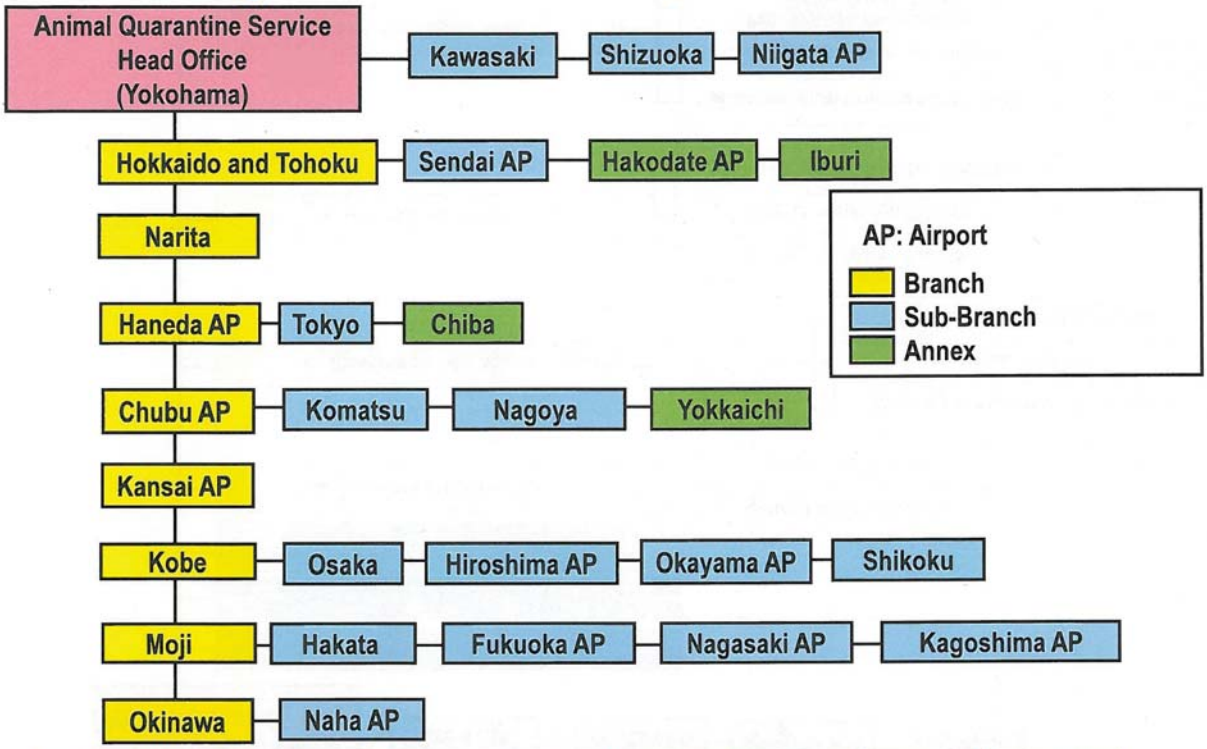
AQS in the Animal Health System of Japan



Location of Animal Quarantine Service and Designated Ports



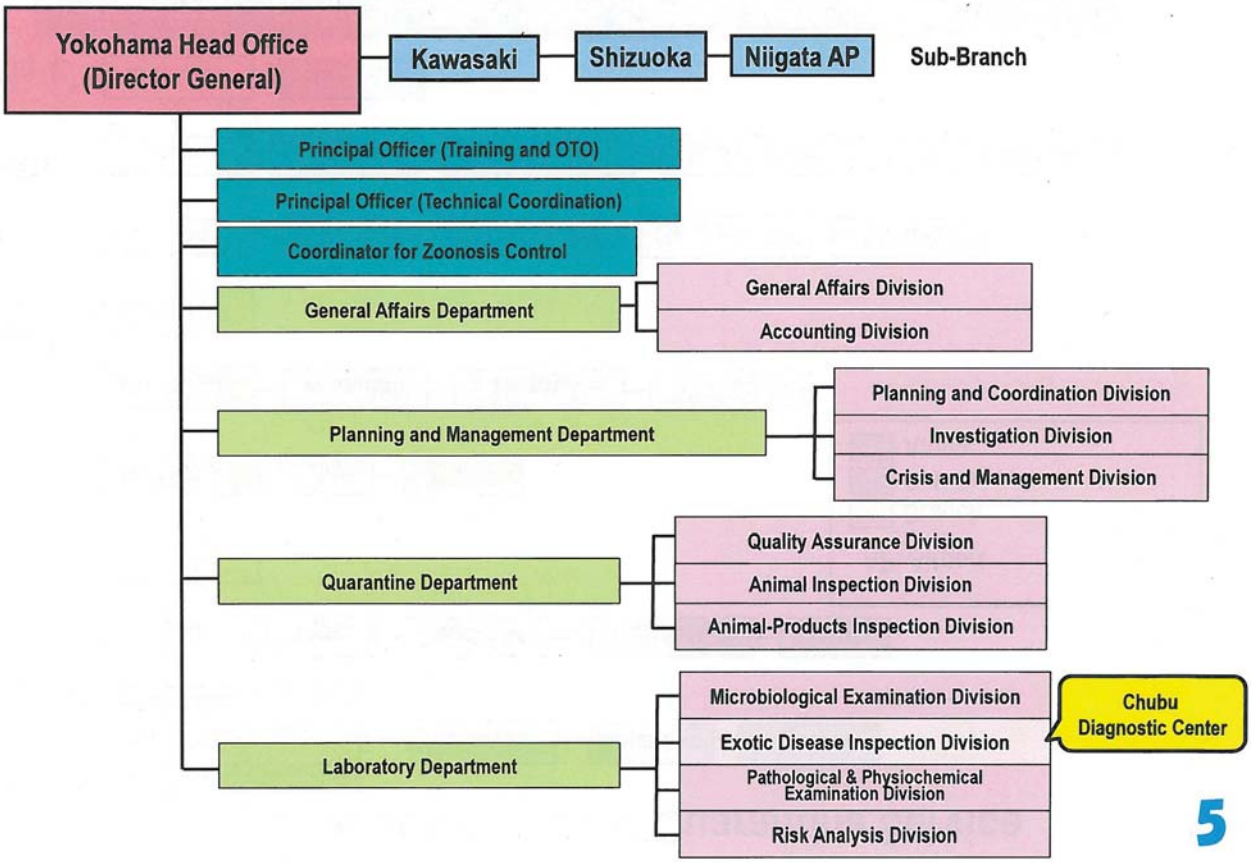
Organization of Animal Quarantine Service



Fiscal Year	1975	1985	1995	2005	2015	2016	2017
No. of Animal Quarantine Officers	122	147	260	319	402	416	435

4

Organization of Yokohama Head Office, AQS, MAFF



5

Relevant Acts

Act	Purpose	Items	Diseases
Act on Domestic Animal Infectious Diseases Control (Law No.166 in 1951)	Promote livestock industry by preventing and controlling infectious diseases (including parasitic diseases) of domestic animals	**•Cloven-hoofed animals** **•Horses** **•Poultry and their eggs** **•Rabbit, honeybees** **•Dogs** **•Animal products such as bone, meat, skin and fur of animals** **•Sausages, ham, bacon** **•Grain straw and hay for animal**	Total 28 domestic animal infectious diseases (for control) and 71 notifiable diseases
Rabies Prevention Act (Law No.247 in 1950)	Improve public health and promote public welfare by prevention, control and eradication of rabies	**•Dogs** **•Cats** **•Raccoons** **•Foxes** **•Skunks**	Rabies

6

Relevant Acts

Act	Purpose	Items	Diseases
Act on the Prevention of Infectious Diseases and Medical Care for Patients Suffering from Infectious Diseases (Law No.114 in 1998)	Improve and promote public health by preventing the incursion and spreading of infectious diseases through measures for prevention of infectious diseases and through medical care for patients with infection	**•Monkeys**	Ebola hemorrhagic fever Marburg disease
Act on the Protection of Fishery Resources (Law No. 313 in 1951)	Prevent the Introduction of Aquatic Animal Disease	Total 21 aquatic animal species **• Finfish** (Salmonidae, Cyprinus carpio, Carassius, Bighead carp, Black carp, Nile tilapia and others.) **• Crustaceans** (Penaeidae, Sergestidae Acetes, Palaemonidae) **• Shellfish, Bivalves and Sea squirt** (Small abalone, Ezo abalone, Ostridae Crassostrea, Yesso scallop, Sea pineapple)	Total 24 diseases Spring viraemia of carp Koi herpesvirus disease Yellowhead disease and others.

7

Import-Prohibited Areas and Products

Source: Article 43 of Enforcement Regulations of Act on Domestic Animals Infectious Control (As of 28 February 2017)

1. Cloven-hoofed animals other than pigs and wild boars (Targeted diseases: rinderpest and foot and mouth disease)

Areas		Live animals	Semen, embryos	Ham, sausage and bacon	Meat and viscera
1) Areas at VERY LOW RISK from which the targeted diseases are highly unlikely to be introduced into Japan through the import of live animals and their products, under comprehensive consideration such as of the outbreak situation and control/preventive measures of the targeted diseases <Europe> Iceland, Ireland, Italy (excluding Sardinia island), United Kingdom (Great Britain and Northern Ireland only), Austria, the Netherlands, San Marino, Switzerland, Sweden, Spain, Slovenia, Czech Republic, Denmark, Germany, Norway, Hungary, Finland, France, Belgium, Poland, Portugal, Lithuania, Liechtenstein <The Americas> USA (Mainland, Hawaii and Guam only), Canada, El Salvador, Guatemala, Costa Rica, Chile, The Dominican Republic, Nicaragua, Panama, Brazil (State of Santa Catalina only), Belize, Honduras, Mexico <Oceania> Australia, Northern Mariana Islands, New Caledonia, New Zealand, Vanuatu		Import allowed The inspection certificate issued by the exporting country must be accompanied N.B.: ✓ Import suspended in case of an outbreak of the targeted disease at the said area. ✓ Import of cattle, sheep or goats and their products; and deer and their products suspended from countries which have outbreaks of bovine spongiform encephalopathy (BSE); and chronic wasting disease (CWD), respectively.			
Import - prohibited area	2) Areas at LOW RISK from which the targeted diseases are unlikely to be introduced into Japan through the import of live animals and their products, under comprehensive consideration such as of the outbreak situation and control/preventive measures of the targeted diseases <Asia> Singapore <Europe> Croatia, Bosnia Herzegovina, Romania	Import prohibited*1		Import prohibited *1 or *2	Import prohibited *2
	3) Areas at UNDENIABLE RISK from which the targeted diseases could be introduced into Japan through the import of live animals and their products Areas other than 1) and 2)	Import prohibited		Import prohibited*3	

*1 a) Animals raised in the farms designated by the exporting country
b) Semen and embryos derived from animals raised in the farms designated by the exporting country, and collected and processed at the facilities designated by the exporting country
c) Ham, sausage and bacon derived from animals which had been raised in the farms designated by the exporting country, and processed at the facilities designated by the exporting country
can be imported (The inspection certificate issued by the exporting country must be accompanied)

*2 Products that had been heat-processed in accordance with the criteria specified by the Minister of MAFF at the facilities designated by the Minister of MAFF or the exporting country can be imported (The inspection certificate issued by the exporting country must be accompanied)

*3 Products that had been heat-processed in accordance with the criteria specified by the Minister of MAFF at the facilities designated by the Minister of MAFF can be imported (The inspection certificate issued by the exporting country must be accompanied)

8

Import-Prohibited Areas and Products

Source: Article 43 of Enforcement Regulations of Act on Domestic Animals Infectious Control (As of 28 February 2017)

2. Pigs and wild boars (Targeted diseases: rinderpest, foot and mouth disease, classical swine fever and African swine fever)

Areas		Live animals	Semen, embryos	Ham, sausage and bacon	Meat and viscera
1) Areas at VERY LOW RISK from which the targeted diseases are highly unlikely to be introduced into Japan through the import of live animals and their products, under comprehensive consideration such as of the outbreak situation and control/preventive measures of the targeted diseases <Europe> Iceland, Ireland, Italy (excluding Sardinia island), United Kingdom (Great Britain and Northern Ireland only), Austria, the Netherlands, San Marino, Switzerland, Sweden, Spain, Slovenia, Czech Republic, Denmark, Germany, Norway, Hungary, Finland, France (excluding the departments of Bas-Rhin, Meurthe-et-Moselle and Moselle), Belgium, Poland, Portugal, Lithuania, Liechtenstein <The Americas> USA (Mainland, Hawaii and Guam only), Canada, El Salvador, Guatemala, Costa Rica, Chile, The Dominican Republic, Nicaragua, Panama, Brazil (State of Santa Catalina only), Belize, Honduras, Mexico <Oceania> Australia, Northern Mariana Islands, New Caledonia, New Zealand, Vanuatu		Import allowed The inspection certificate issued by the exporting country must be accompanied N.B.: ✓ Import suspended in case of an outbreak of the targeted disease at the said area.			
Import - prohibited area	2) Areas at UNDENIABLE RISK from which the targeted diseases could be introduced into Japan through the import of live animals and their products Areas other than 1)	Import prohibited		Import prohibited*	

* Products that had been heat-processed in accordance with the criteria specified by the Minister of MAFF at the facilities designated by the Minister of MAFF can be imported (The inspection certificate issued by the exporting country must be accompanied)

9

Import-Prohibited Areas and Products

Source: Article 43 of Enforcement Regulations of Act on Domestic Animals Infectious Control (As of 28 February 2017)

3. Poultry
(Targeted disease: highly pathogenic avian influenza)

Areas		Live animals	Semen, embryos	Ham, sausage and bacon	Meat and viscera	Egg
1) Areas at VERY LOW RISK from which the targeted disease is highly unlikely to be introduced into Japan through the import of live animals and their products, under comprehensive consideration such as of the outbreak situation and control/preventive measures of the targeted disease <Asia> Singapore, Thailand, the Philippines, Malaysia <Europe> United Kingdom (Great Britain and Northern Ireland only), Austria, the Netherlands, Sweden, Spain, Denmark, Germany, Hungary, Finland, Bulgaria, Belgium, Poland, Portugal, Latvia, Lithuania <The Americas> USA (Mainland, Hawaii and Guam only), Canada, Argentina, Costa Rica, Columbia, Chile, Brazil, Peru <Oceania> Australia, New Caledonia, New Zealand,		Import allowed The inspection certificate issued by the exporting country must be accompanied N.B.: ✓ Import suspended in case of an outbreak of avian influenza at the said area.				
Import - prohibited area	2) Areas at UNDENIABLE RISK from which the targeted disease could be introduced into Japan through the import of live animals and their products Areas other than 1)	Import prohibited		Import prohibited *		

* Products that had been heat-processed in accordance with the criteria specified by the Minister of MAFF at the facilities designated by the Minister of MAFF can be imported (The inspection certificate issued by the exporting country must be accompanied)

10

Import-Prohibited Areas and Products

Source: Article 43 of Enforcement Regulations of Act on Domestic Animals Infectious Control (As of 28 February 2017)

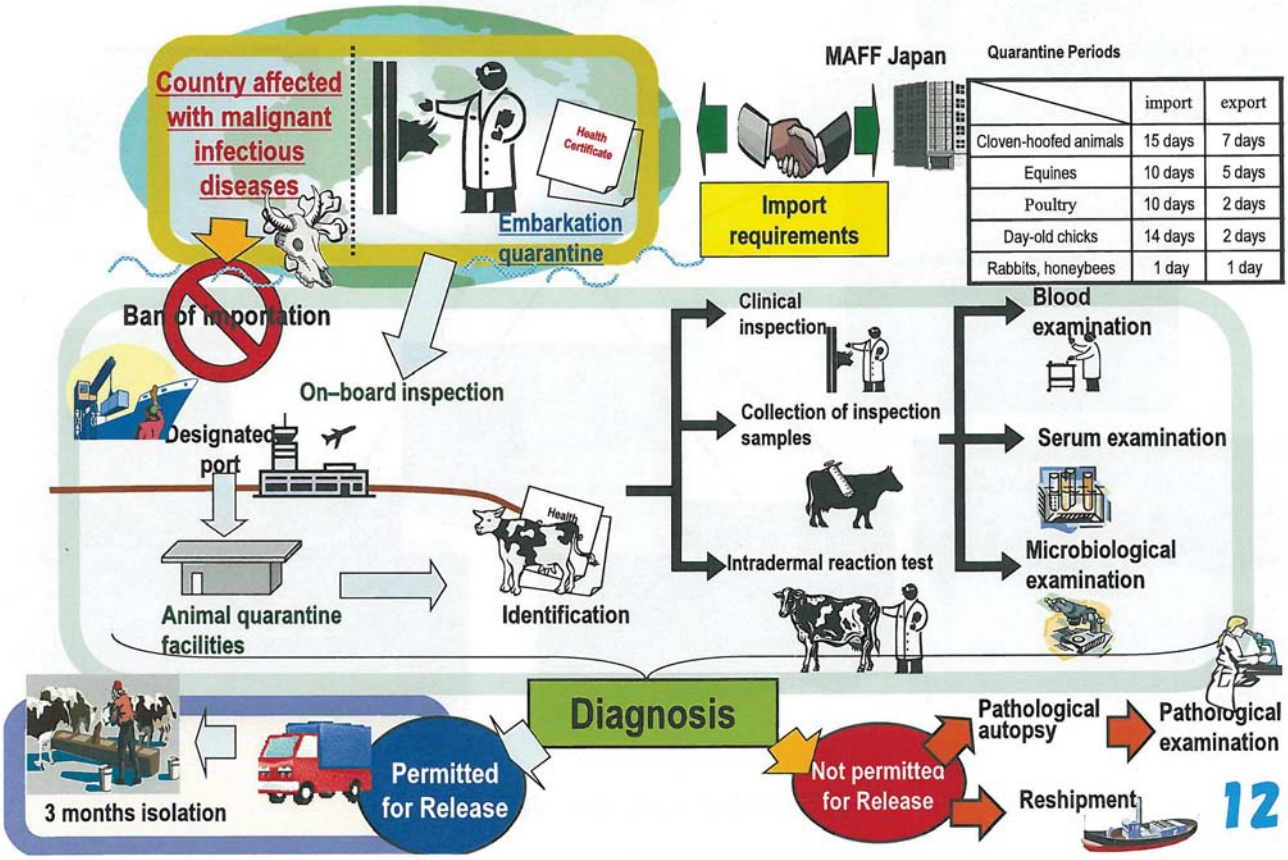
4. Straw of cereal crop and forage for feed
(Targeted disease: foot and mouth disease)

Areas		Live animals	Semen, embryos	Ham, sausage and bacon	Meat and viscera
1) Areas at VERY LOW RISK from which the targeted disease is highly unlikely to be introduced into Japan through the import of live animals and their products, under comprehensive consideration such as of the outbreak situation and control/preventive measures of the targeted disease <Europe> Iceland, Ireland, Italy (excluding Sardinia island), United Kingdom (Great Britain and Northern Ireland only), Austria, the Netherlands, San Marino, Switzerland, Sweden, Spain, Slovenia, Czech Republic, Denmark, Germany, Norway, Hungary, Finland, France, Belgium, Poland, Portugal, Lithuania, Liechtenstein <The Americas> USA (Mainland, Hawaii and Guam only), Canada, El Salvador, Guatemala, Costa Rica, Chile, The Dominican Republic, Nicaragua, Panama, Brazil (State of Santa Catalina only), Belize, Honduras, Mexico <Oceania> Australia, Northern Mariana Islands, New Caledonia, New Zealand, Vanuatu		Animal quarantine is not required			
Import - prohibited area	2) Areas at UNDENIABLE RISK from which the targeted disease could be introduced into Japan through the import of live animals and their products Areas other than 1)	Import prohibited*			

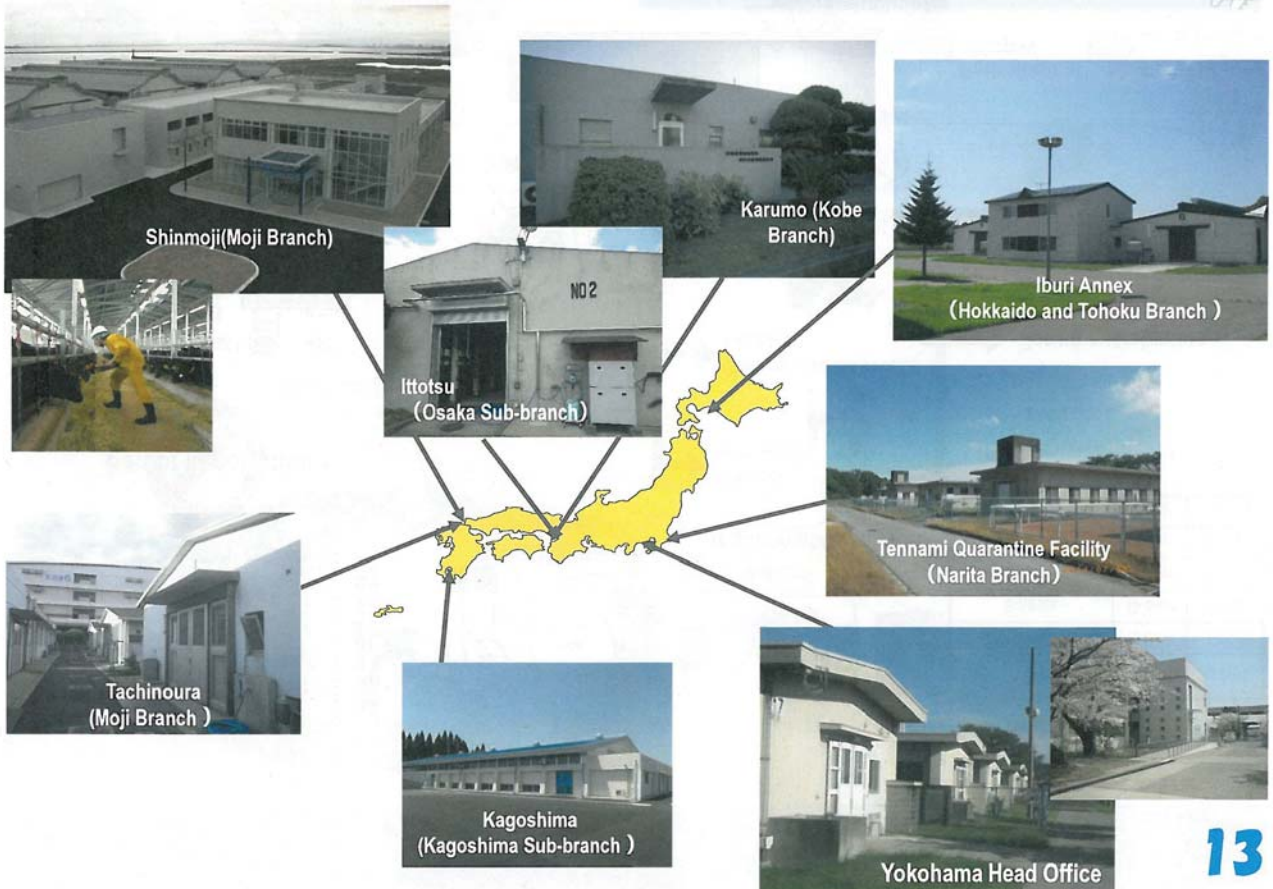
* Products that had been heat-processed in accordance with the criteria specified by the Minister of MAFF at the facilities designated by the Minister of MAFF can be imported (The inspection certificate issued by the exporting country must be accompanied)

11

Procedure of Inspection of Livestock Animals



Quarantine Facilities



Inspection on-arrival


On-board inspection


Clinical inspection at the warehouse

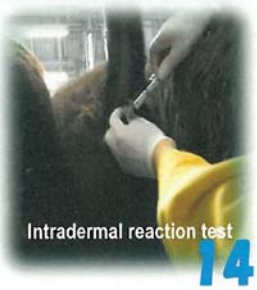
Import Inspections

Laboratory Examination


Serological examination


Microbiological examination


Microscopic Examination


Intradermal reaction test

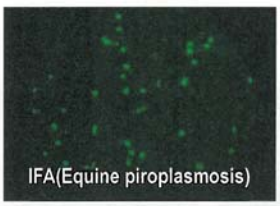
14

Microbiological Examination Division

Conducts viral, bacterial and parasite laboratory examinations, and their research and development.

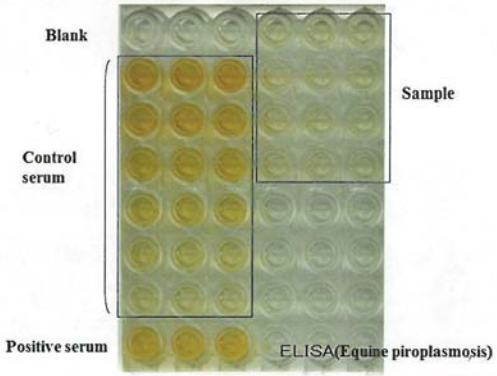
- **Neutralization test :** e.g. Equine viral arteritis, classical swine fever, Aujeszky disease, vesicular stomatitis

- **Indirect fluorescent antibody test :**
  Equine piroplasmosis,
  Porcine reproductive and respiratory syndrome


IFA(Equine piroplasmosis)

- **Complement fixation test:** Equine piroplasmosis

- **ELISA :** Foot and mouth disease, equine viral arteritis, equine piroplasmosis



ELISA(Equine piroplasmosis)

- **Virus isolation :**
  e.g. Bovine viral diarrhea-mucosal disease

15

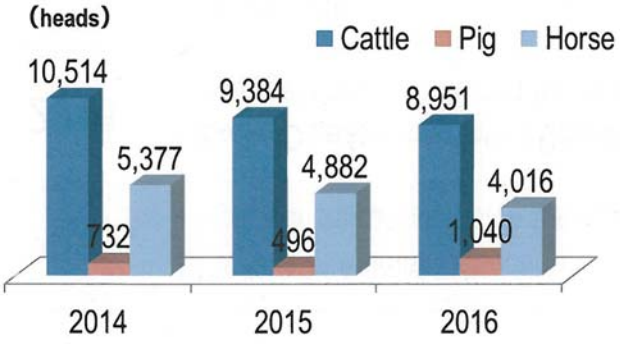
Quality control of Laboratories Acquisition of ISO/IEC17025

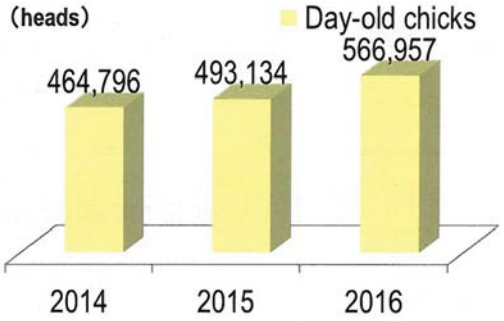
2012	First acquisition as a veterinary laboratory in Japan. Division of Microbiological Inspection Agar gel immunodiffusion for equine infectious anaemia
2013	Division of Pathological and Physiochemical Inspection Detection of DNA of animal origin in fish meal by PCR based on feed analysis criteria
2014	Division of Microbiological Inspection Viral neutralisation test for Aujeszky's disease
2015	Division of Animal Inspection Agar gel immunodiffusion for equine infectious anaemia
2016	Exotic Disease Inspection Division Agar gel immunodiffusion for avian influenza
2017	Moji Branch Agar gel immunodiffusion for equine infectious anaemia


PERRY JOHNSON LABORATORY ACCREDITATION, INC.
Certificate of Accreditation
ISO/IEC 17025:2005

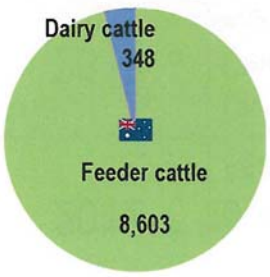
16

Number of Imported Livestock



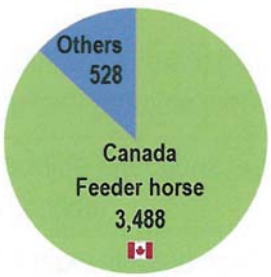


Cattle (All from Australia)



Breeder Pig

Horse



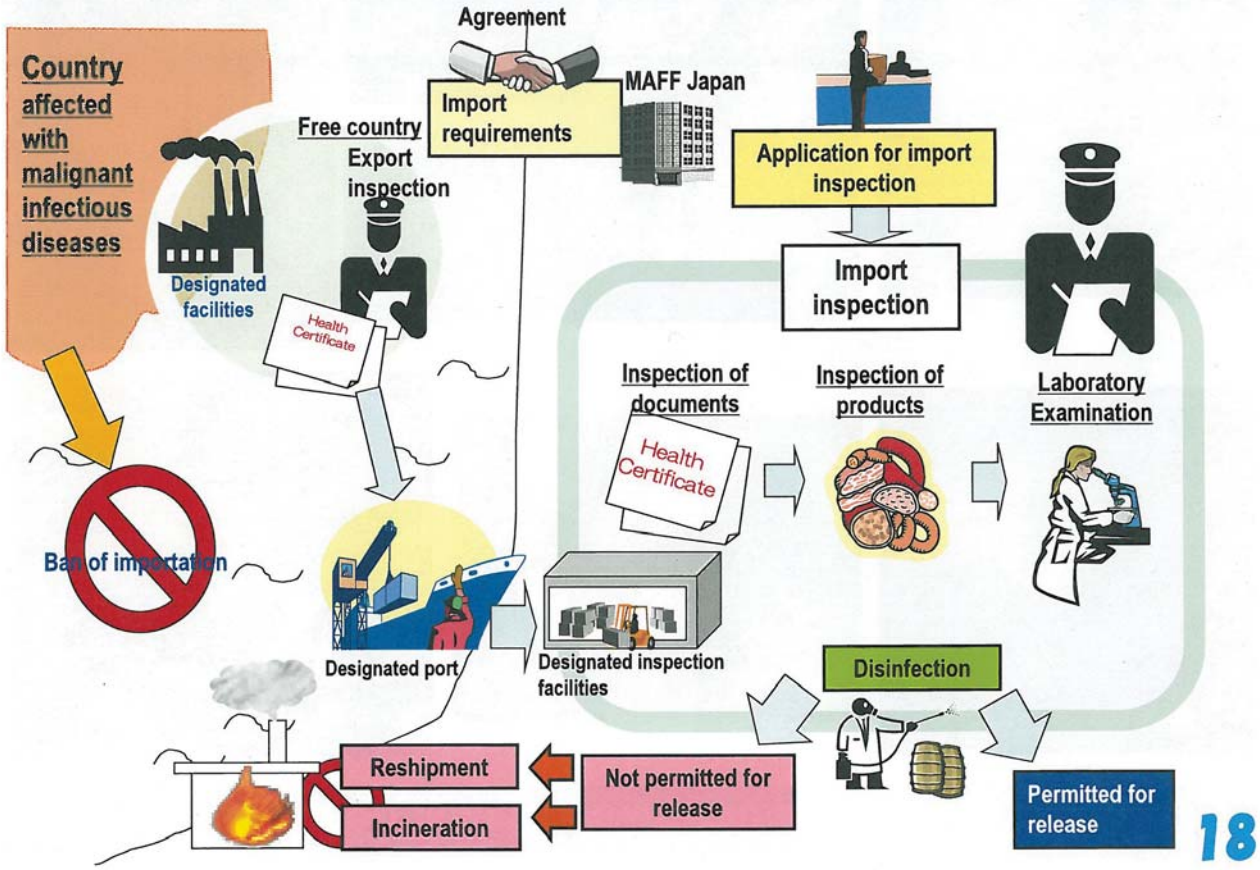
Day-old chicks (chicken)

Breakdown by countries of origin or its use (2016)

※The data in 2016 is preliminary

17

Procedure of Inspection of Animal Products



18

Import inspection of animal products

19

Import Inspection of Animal Products

(Act on Domestic Animal Infectious Diseases Control)

1 Arrive at sea port

2 Bring in the designated warehouse for inspection

3 Document check

4 Inspection of products

5 Laboratory inspection

6 Disinfection

Passed the inspection → 7 Issue Import Quarantine Certificate

Rejected → 8 Reship, incinerate or bury

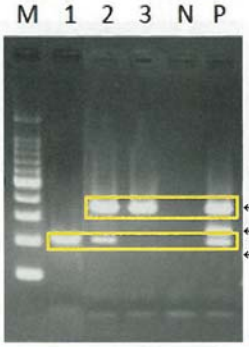
Designated quarantine items

(1) Eggs
(2) Bones, meat, fat, blood, skins, feathers, pelage, horns, hooves, tendons and organs
(3) Bone meal, meat meal, blood meal, hide powder, feather powder, hoof and horn powder, organ powder
(4) Raw milk, sperm, fertilized eggs, unfertilized eggs, feces, urine
(5) Hams, sausages, bacon
(6) Hay for feed such as straw of cereal plants

20

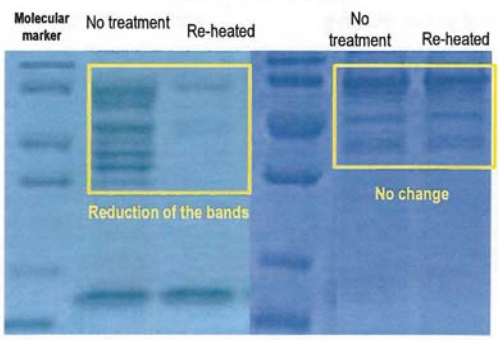
Laboratory Inspection of Animal Products

Species identification test



1: Chicken (+)
2: Pork (+), Chicken (+)
3: Pork (+)
N: NC
P: PC
M: Molecular marker

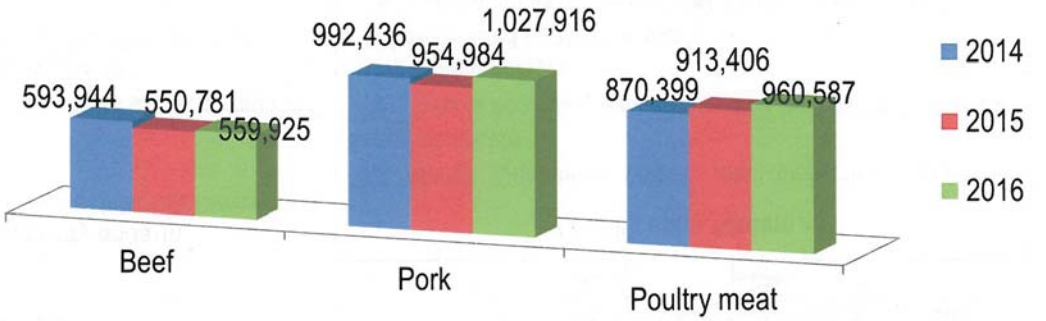
Heat treatment test



Insufficient heat treatment ✖ Sufficient heat treatment ○

21

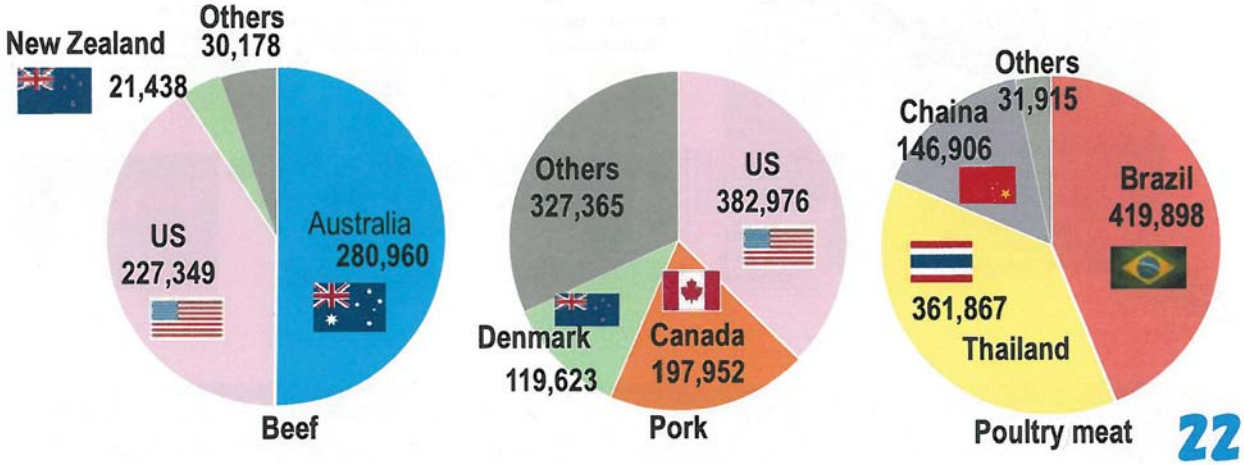
Number of Imported Animal Products



The data in 2016 is preliminary

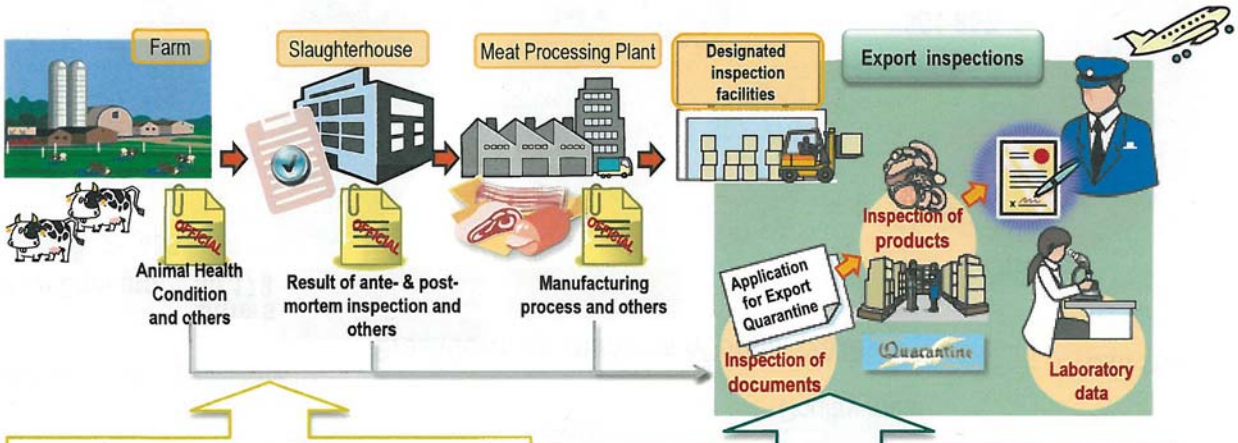
Unit : ton

Breakdown by countries of origin (2016)



22

Procedure of Export Inspection of Animal Products



+ Strict bio-security on farm
(Act on Domestic Animal Infectious Disease Control)

+ Ensuring food safety at each stage of the food supply process
(Slaughterhouse Act, Food Sanitation Act)

~ Certification System ~

The Animal Quarantine Officer, after inspection, issues an export certificate
- for animals and other items required by the government of the importing country; and
- for designated quarantine goods *

* e.g. Live animals (cloven-hoofed animals, horse, chicken) and meat, viscera, eggs, bones, hide and hairs thereof.

(Article 45 of Act on Domestic Animal Infectious Diseases Control)

23

Documentations and Inspection of the Products

【 Submitted documents 】

Application for export quarantine (Applicator/Exporter)

Certificate on disease freedom (Issued by prefectural Livestock Hygiene Service Centers)

Meat Inspection Certificate (Issues by Meat Inspection Centers of the local government)

Export Quarantine Certificate (Issued by AQS)

Designated inspection warehouse

Inspection of export products

24

Souvenir from Japan

＜Export conditions for Singapore＞

-Maximum 5kg per person

-For personal consumption only

-Products commercially sold in Japan

-Products made from/of Japanese beef and/or pork

以盾纸表示安全

＜Export conditions for Brazil＞

-You can bring the following processed meat products into Brazil.

Dry meat products, heat-processed meat products, dry sausage, salami sausage, beef jerky, pork jerky, pressed ham, wiener, frankfurter

-Maximum 10kg per person

- For personal consumption only

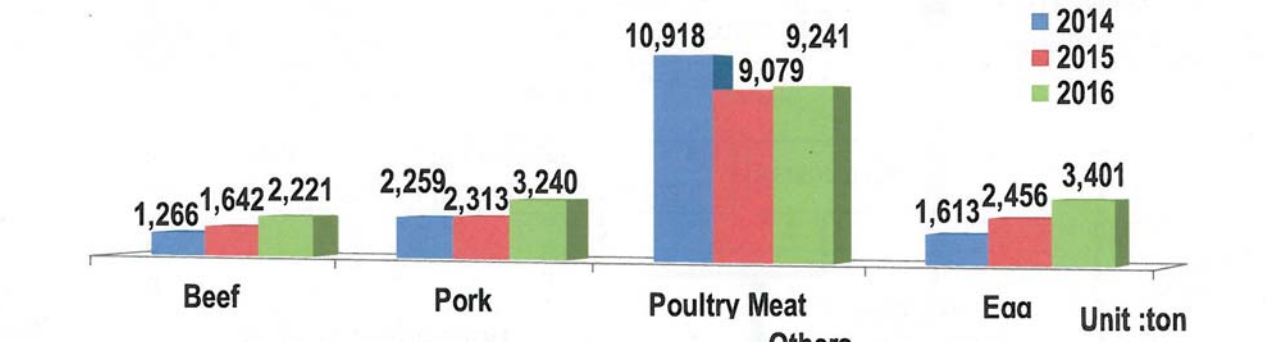
-Products are distributed in Japan.

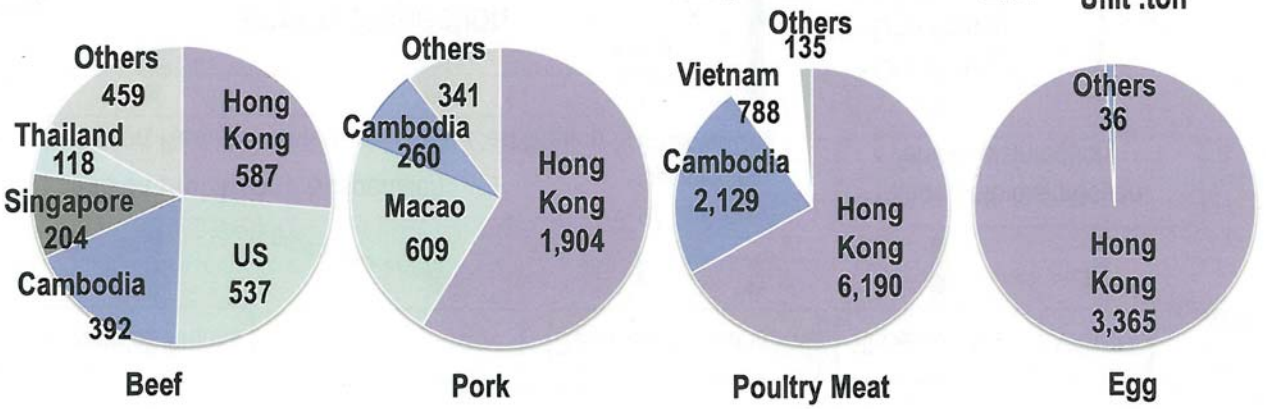
-Products must be sealed.

25

Number of Exported Animal Products

※The data in 2016 is preliminary

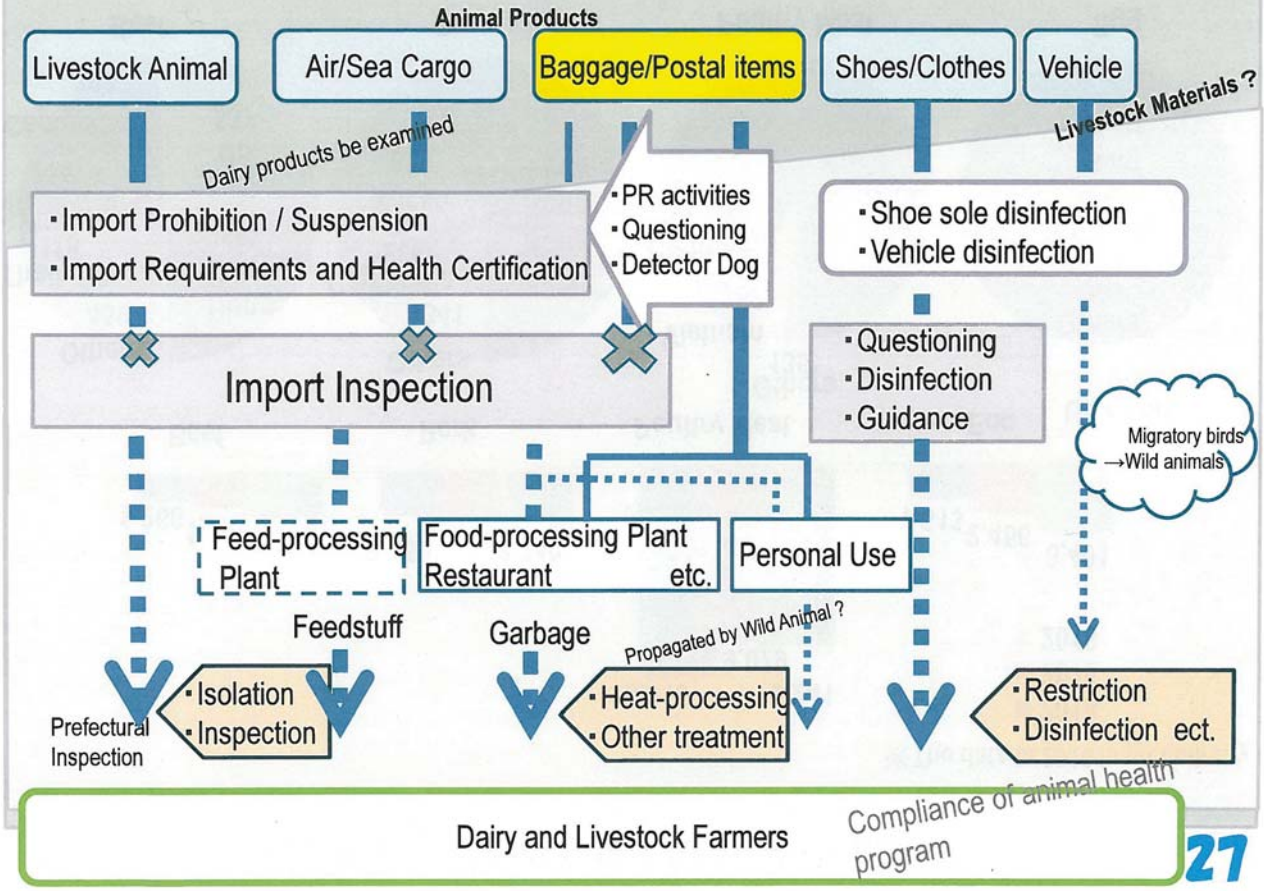




Breakdown by countries of origin (2016)

26

Invasion Pathway of Animal Infectious Disease and Control Measures



27

Enhancement of Border Control to Animal Infectious Diseases

Country affected with malignant infectious diseases (FMD etc.)

- Do not visit a stock farm
- Do not touch livestock animals
- Do not bring in an illegal animal product

◆Enlightenment activities in the intl' departure lobby

→Poster, leaflet
→Announcement & Video picture

◆Announcement & Questionnaire

→Announcement for all passengers.
→Distribution of the animal quarantine questionnaire

Japan

Information to the public

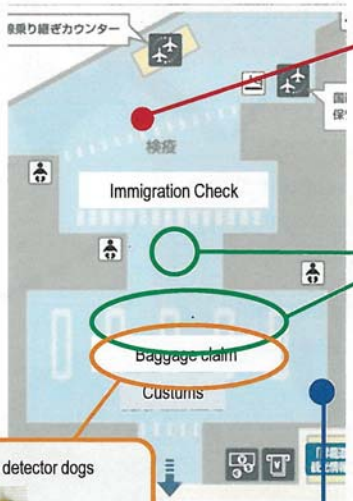
- Public service announcement
- Internet website, Banner advertisings

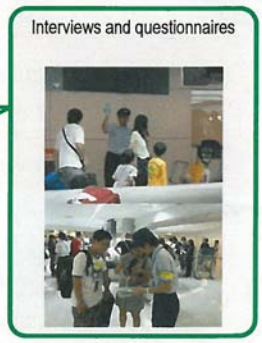
◆Inspection and control

→Disinfection of all shoe-soles
→Inspection and disinfection of baggage
→Use AQS detector dogs

28

Border measures at International Airports





29

Border Measures at International Airports

Inspections of hand luggage

Shoe sole disinfection mat

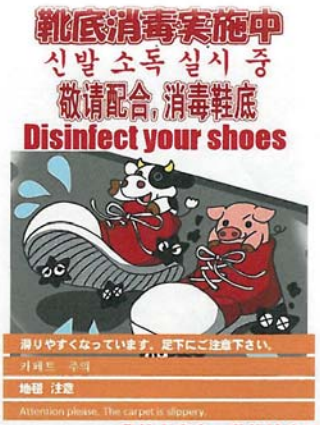
Warnings for passengers on the restriction of import of meat products

Interviews and awareness-raisings

中国語　　韓国語

30

Enhancement of Animal Quarantine Measure (Disinfection of Shoe-sole)



31

Animal and Plant Quarantine Detector Dogs

Detector dogs are・・・

- the trained dogs which can detect animal products from traveler's luggage.

Detection
(mainly operated by private companies)

Dogs inform the handler on the detection of animal products in a luggage by sitting on the floor.

Animal quarantine officer inspects the products.

Target products

Meat

Ham, Sausage and Bacon

Meat products

Fruit

Results (2016)

e.g.
Kansai AP.・・・ 13,894 kg (10,149 cases)
Narita AP・・・13,298 kg (6,809 cases)
Haneda AP・・・5,885 kg (4,530 cases)
Chubu AP・・・2,667 kg (1,674 cases)

※The data in 2016 is preliminary

32

Outline of Quarantine Detector Dogs in Japan

○ Quarantine detector dogs discovers the target of animal and plant quarantine from the baggage of passengers and have contributed to prevent animal products and plant products that are brought into Japan illegally.
※Number of Quarantine detector dog is 26 in Japan (Beagle:24 Head、Labrador Retriever:2 Head)

Chitose Airport

Nitro (Male) Roxy (Female)

Narita Airport

Tina (Female) Gary (Male) Albert (Male) Bayou (Male) Megu (Female) Botan (Female)

Haneda Airport

Bucky (Male) Neal (Male) Davu (Female) Tally (Male)

Kansai Airport

Cecil (Male) Fuji (Male) Bo (Male) Jag (Male) Momo (Female) Tarou (male)

Chubu Airport

Hunter (Male) Litteleman (Male)

Fukuoka Airport

Tank (Male) Alexis (Female)

Naha Airport

Ceasar (Male) Rusty (Male)

Kawasaki Post office

Harper (Female) Bean (Female)

33

Risk Management (Luggage Inspection)

Awareness raising of/through the host organizations inviting foreign students and trainees

Demonstration of the risk: Viral isolation from illegal import products from Asian countries e.g. Avian influenza virus

Monitoring target :Poultry meat from China, Taiwan and others. (June 2015～)

Country of Origin	Species	Isolation of virus (number of isolate)
China	Duck Meat/Carcass	H9N2(2)
		H1N2(1)
		H5N6(1)
	Chicken Meat/Carcass	H9N2(1)
		H5N1(1)
		H5N6(1)
Taiwan		H9N2(1)
Philippine		ND Virus(1)
China	Duck Meat/Carcass	H7N9(1)
Vietnam	Chicken Meat/Carcass	ND Virus(1)
China	Chicken Meat/Carcass	H9N2(1)
Vietnam	Chicken Meat/Carcass	H9N2(2)

34

Storage of protective equipment for disease control (large equipment)

● **Decontamination tent**

For the decontamination of operators on-site（26 sets）

● **Electric culling machine**

Main use is for culling pigs.
（20 units）

Moji Branch
（Shi-Moji　QS）

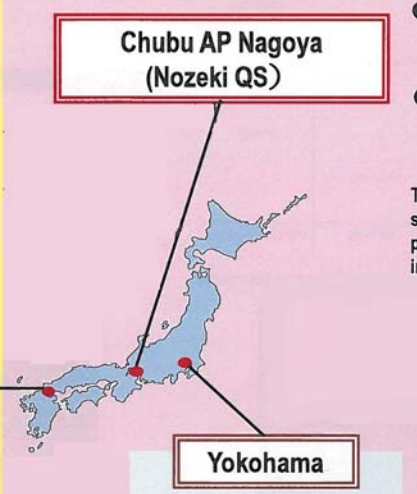
● **Mobile vehicle disinfector(prefabricated)**

Installed at the farm entrance/exit to disinfect vehicles.
（5 units）

● **Mobile incinerator（prefabricated）（1 unit）**

● **Wide-area controller（1 unit）**

● **Poultry foam depopulation system（1 unit）**



● **Decontamination tent**
（6 sets）

● **Mobile incinerator(prefabricated) (2 units)**

● **Mobile incinerator**
(1 unit)

To be used when lacking suitable burial site and processing capacity of the incineration plant.

● **Wide-area controller**

Primary use is disinfection of barn or certain objects
（1unit）

● **Mobile rendering equipment**

Decontaminate and reduce the amount of disposals by destroying the dead bodies. (1 unit)

● **Poultry foam depopulation system**

To be used when culling poultry in limited space or tight flat shepherd poultry barns.（1 unit）

35

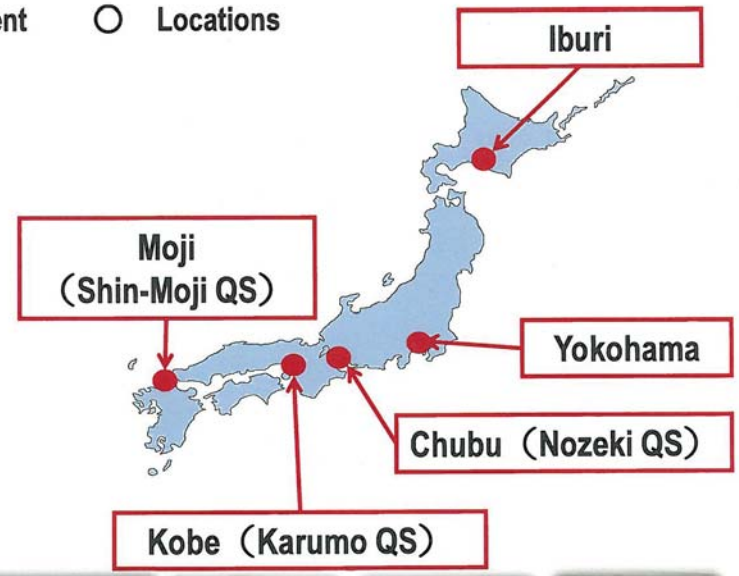
Storage of protective equipment for disease control

○ List of stored protective equipment

Boots
Goggles
Masks
Shoes cover
Gloves
Syringe barrels , Needles
Continuous syringes and needles for birds
Continuous syringes and needles for pigs
Ear tag
Flexible intermediate bulk container(FIBC)
Medical waste container
Sole disinfectant mat
Soda ash
Slaked lime

* Also Foot-and-mouth disease vaccine (Kobe) and Avian influenza vaccine (Yokohama、Kobe、Shinmoji) were stored.

○ Locations



36

Questions from MAFF

- There are continuous outbreaks of AI in Taiwan. Could you let us know the policy on prevention?
- Especially, we would like to know how you are going to manage disposal of culled fowl by burying or other ways in limited area.
- （鳥インフルエンザが継続的に発生しているが）今後どういう方針で防除を進めていくのか。
- 殺処分後の埋却等処理について、国土が限られる中でどう対応しているかについては、是非伺いたい。

Question 1-強化預警機制

- 依禽場風險高低，以逢機採樣方式加強主動監測。
- 監控化製場化製數量及屠宰衛生檢查異常情形回溯追蹤。
- 強化邊境檢疫及走私查緝執行。
- 密切注意冬季候鳥遷徙路徑上游國家及國外等疫情資訊。
- 加強家禽產業相關業者及獸醫師教育宣導。
- 提供禽畜業及動物防疫相關人員公費流感疫苗接種，避免病毒重組造成跨物種感染。
- 提醒民眾勿接觸禽鳥或隨意撿拾禽鳥屍體，食用雞、鴨、鵝及蛋類要熟食，處理生禽肉或蛋時應清洗乾淨，並落實洗手等個人良好衛生習慣。

Question 1-提升防疫因應機制

- 各直轄市、縣（市）政府依據「H5、H7亞型禽流感防治措施」公告，督導禽場依期程改善禽舍硬體設施，並與中央政府組成聯合稽查小組，加強稽查。
- 透過3道把關程序，強化禽場建康狀況查察：
  第1道：由特約獸醫師檢查家禽健康良好後，簽署「家禽健康證明書」。
  第2道：由所在地動物防疫人員配合採樣監測、疫情調查等執行現場家禽健康狀況查察。
  第3道：家禽運至屠宰場時，由屠宰衛生檢查獸醫師執行屠前及屠後檢查。
- 持續推動「禽蛋燻蒸證明」與「運輸車輛及裝載箱籠清洗消毒措施」等措施，以降低疫病傳播的風險。
- 與直轄市、縣（市）政府盤點轄內人力、物資、動物撲殺及屍體處理量能等進行編組、規劃及沙盤推演，預為因應可能發生之疫情。
- 提升跨部會協調機制，保持聯繫管道暢通。
- 密切監測發生禽流感疫情之禽場人員及執行撲殺/清場作業相關工作人員健康情形，若出現急性呼吸道感染症狀，應主動通報地方衛生機關，以協助就醫。

Question 1

- 牧場端主動通報，儘早發現可疑案例，即時處置以降低疫情傳播的風險。
- 提高禽場的生物安全規格，避免不同週齡雞隻混養、縮短雞隻出清時間，水禽避免與候鳥接觸。
- 強化禽場基礎設施及生物安全操作，朝具有生物安全基礎防護之非開放式禽舍飼養，搭配門禁管制、人車消毒等軟體生物安全措施。
- 依「防範家禽流行性感冒（H5、H7 亞型）緊急應變措施手冊」辦理防疫。

Question 1

- 獸醫師在屠宰衛生檢驗過程發現時，第1時間立即將可疑的同批屠體凍存，避免流入市面。
- 啟動來源場的回溯機制，對來源進行管制、檢查及檢驗，以確認可疑案例，即時處置，降低疫情傳播的風檢。

Question 1

- 鴨隻應經檢驗禽流感陰性，始得上市屠宰。檢驗陰性者由中央畜產會4區家禽保健中心或家畜衛生試驗所發給檢驗報告，檢附該檢驗報告者始能上市屠宰，檢驗報告效期為14天。
- 加強禽蛋燻蒸證明之查核，加強家禽健康證明書及鴨場檢驗報告查驗。

Question 2

- 依據「動物傳染病防治條例」之規定，動物屍體可以燒燬、掩埋或化製等方式處理，但有鑒於土地之取得、附近居民之抗議、環境、地下水與掩埋後續之管理等等，都是日後嚴重之課題，因此以燒燬或化製列為大量動物屍體之優先處理模式。

Question 2

無感染人類之家禽流行性感冒之動物屍體，認定為一般事業廢棄物：

- 依「動物傳染病防治條例」之規定，防疫人員之指示，行燒燬、掩埋或委託代清除、處理，並進行消毒及其他必要處置。
- 地方環保機關於接獲農政機關請求支援時，應立即安排運往轄內之都市垃圾焚化爐進行焚化處理。
- 如該發生疫情轄區內無都市垃圾焚化爐，則該管環保機關應立即協調鄰近縣市環保機關，俾送往距離最近之都市垃圾焚化爐進行焚化處理，相關縣市環保機關應予配合。

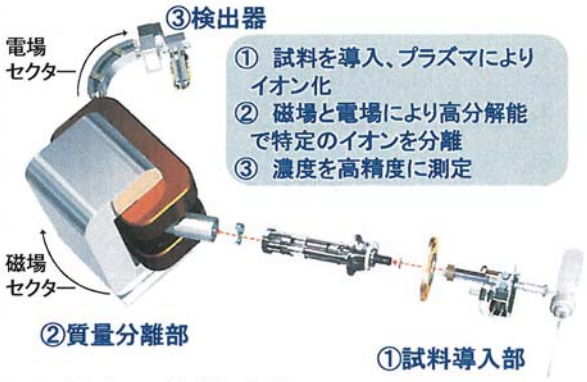
Question 2

- 動物屍體若屬有感染人類之虞部分，則應認定為感染性事業廢棄物，地方環保機關應協助農政機關送往經環保機關核可且具有效消滅病毒焚化設施之甲級廢棄物處理、清理機構處理。

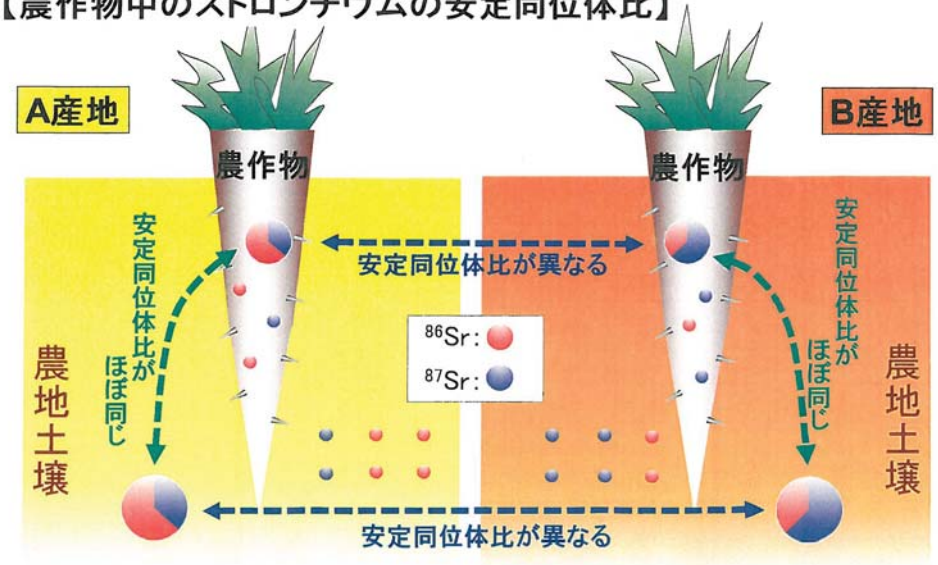
ストロンチウム安定同位体比分析による原産地の判別

農作物に含まれるストロンチウムの安定同位体比（$^{87}Sr/^{86}Sr$）は、農作物が生育した農地土壌のそれとほぼ同じ値になると考えられています。
一方で、農地土壌に含まれるストロンチウムの安定同位体比は、地域ごとに異なる値をもつ傾向があります。
このため、農作物に含まれるストロンチウムの安定同位体比を正確に測定することができれば、原産地の推定に役立つと考えられます。

【二重収束型誘導結合プラズマ質量分析装置】



【農作物中のストロンチウムの安定同位体比】

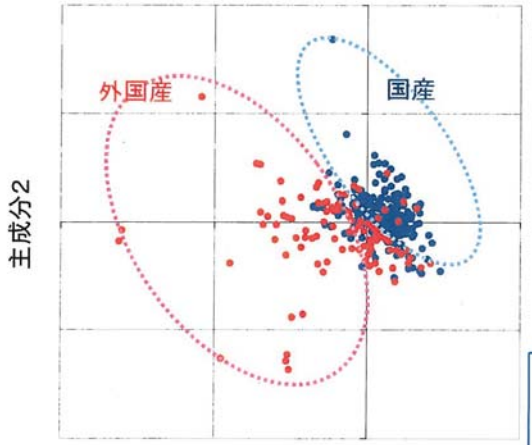


うなぎ加工品の原料原産地判別

うなぎ加工品（うなぎの蒲焼き）には、国内の産地で飼養されたウナギを原料として国内で加工されたもののほか、中国、台湾等からうなぎ加工品として輸入されたものがあります。
うなぎ加工品には原料となるウナギの原料原産地表示が義務付けられていますが、外見から原料ウナギの原産国を区別することは難しく、原料原産地の科学的検査法の開発が求められてきました。

方法

うなぎ加工品を粉砕後、酵素分解して肉間骨を採取します。
肉間骨を酸分解して、複数の元素の濃度を誘導結合プラズマ質量分析装置により測定します。
測定データを統計解析結果をもとにあらかじめ構築しておいた判別モデルと照らし合わせることにより、原料ウナギの原産地が国産か外国産（この場合、中国産又は台湾産）かを判別します。



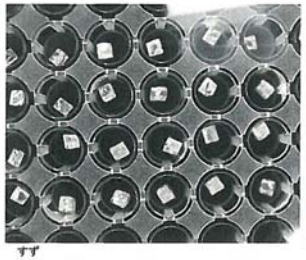
元素濃度の統計解析結果の例

※実際に検査で使用している判別モデルとは異なります。

はちみつの真正性確認検査①
（原材料名等の確認）

『純粋はちみつ』と表示された製品に、異性化液糖などの糖類が混合されていないか、すなわち、純粋はちみつという表示が正しいか否かを、炭素安定同位体比の分析により判別します。

はちみつのサンプリング



錫（すず）容器にはちみつを封入

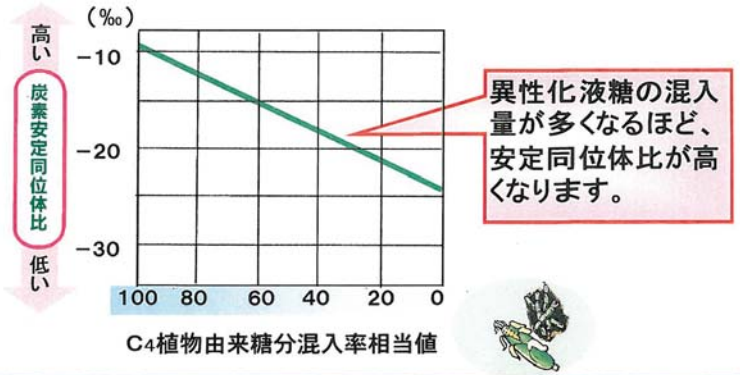
安定同位体比測定装置で分析

自然界の炭素には、質量数が12の炭素（^{12}C）98．9%と、質量数が13の炭素（^{13}C）1．1%という2つの安定同位体があります。

また、C_3植物とC_4植物では光合成の経路が異なり、C_4植物では^{13}Cを固定化する割合がC_3植物に比べて高くなっています。

このため、^{12}Cに対する^{13}Cの割合（安定同位体比）を分析することで、C_3植物を蜜源としたはちみつに、C_4植物から作られた異性化液糖などが使われているか否かを判別することができます。

C_3植物：レンゲ、ニセアカシア、クローバー等
C_4植物：トウモロコシ（異性化液糖）、サトウキビ（砂糖）等



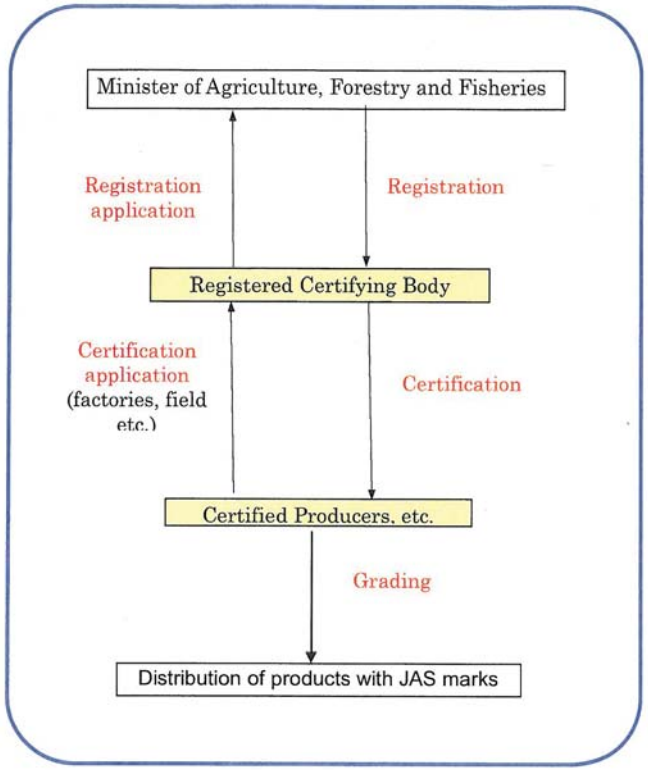
List of JAS products

July, 2014

I	Bevalrages, foods and oil		
1	Instant noodles	28	Hams
2	Dried Japanese noodles	29	Pressed ham
3	Macaroni Products	30	Sausage
4	Vegetable protein and seasoned vegetable protein	31	Mixed sausage
5	Shoyu (soy sauce)	32	Bacons
6	Worcester sauces	33	Hamburger patty
7	Flavored seasonings	34	Chilled hamburger steak
8	Dressings	35	Chilled meatball
9	Vinegar	36	Shavings of dried fish
10	Processed tomato products	37	Boiled and dried small fishes
11	Carrot juice and carrot mixed juice	38	Panko (breadcrumbs)
12	Dehydrated soup	39	Aged hams
13	Margarines	40	Aged sausages
14	Shortening	41	Aged bacons
15	Refined lard	42	Naturally grown chicken
16	Edible refined and processed oils and fats	43	Hand-made Somen
17	Edible vegetable oils and fats	44	Organic agricultural products
18	Glucose	45	Organic processed foods
19	High fructosecorn syrup and sugar added high fructose corn syrup	46	Organic feeds
20	Jams	47	Organic livestock products
21	Fruit juice and fruit beverage	48	Beef with production information
22	Carbonated drinks	49	Pork with production information
23	Soy milks	50	Agricultural products with production information
24	Canned agricultural products and bottled agricultural products	51	Caltivated fish with production information
25	Canned livestock products and bottled livestock products	52	Pure apple juice not from concentrate
26	Canned marine products and bottled marine products	53	Processed foods distributed under fixed temperature control
27	Pickled agricultural products		

II	Forestry products
1	Log
2	Sawn lumber
3	Glued laminated timber
4	Structural lumber for wood frame construction
5	Finger－joint structural lumber for wood frame construction
6	Laminated veneer lumber
7	Structural panel
8	Plywood
9	Flooring
10	Cross laminated timber

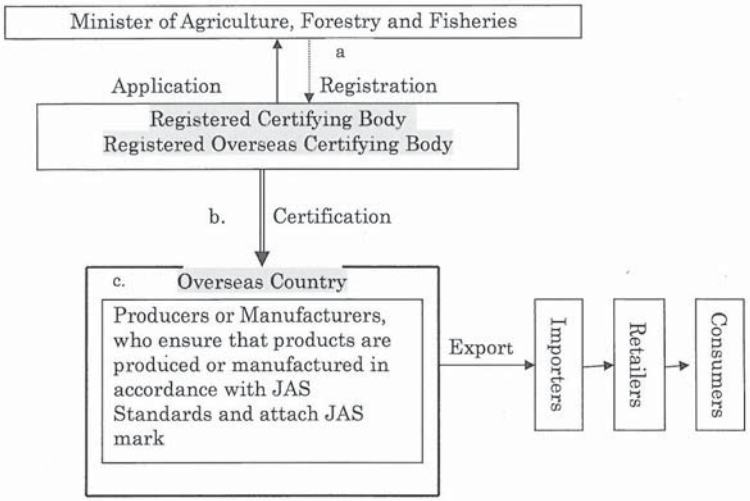
III	Farm products
1	Tatami facing
2	Raw silk



Flows of Imported Products with JAS Marks

1. Grading by Registered Japanese Certifying Bodies or Registered Overseas Certifying Bodies

Flow



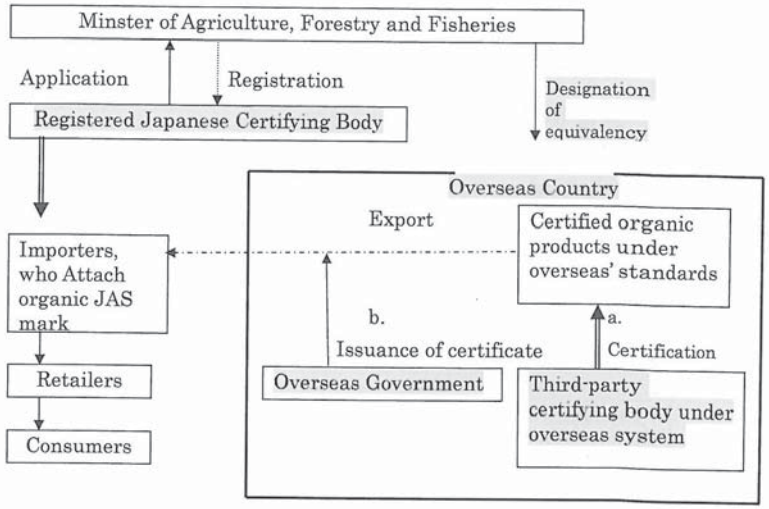
a. The Minister of Agriculture, Forestry and Fisheries registers Japanese Certifying Bodies or Overseas Certifying Bodies.

b. Those Registered Certifying Bodies certify producers, manufacturers and other business entities of agricultural and forestry products.

c. The certified producers, manufacturers or other business entities produce, or manufacture products, and attach JAS marks to the products.

2. Labeling of Organic JAS Marks by Importers Certified by Registered Japanese Certifying Bodies
   - The Scheme Applicable Only to Organic Agricultural Products and Organic Agricultural Processed Foods -

Flow



a. Third party certifiers under legislations of overseas countries whose organic rules and standards Japan approved as equivalent certify organic foods in accordance with the organic rules and standards of those countries.

b. Government agencies or quasi-governmental organizations of the countries with organic equivalency issue export certificates to certify the organic foods produced or manufactured in the countries were graded in accordance with the organic system of the countries.

c. Importers certified by Registered Japanese Certifying Bodies import organic foods and relabel the Organic JAS mark to the products in Japan.

Note:

1. Countries whose organic rules and standards Japan approved as equivalent are provided in Article 37 of the Ministerial Ordinance.

2. The importers authorized to attach the Organic JAS mark to the products are limited to those who are certified by Registered Japanese Certifying Bodies in order to guarantee the adequacy of imported organic foods by:

a). Guidance by the MAFF or Registered Japanese Certifying Bodies to the relevant parties in the case of improper labeling; and

b). Management of the importers by Registered Japanese Certifying Bodies, including keeping grading records.

Countries whose Organic Certification System is regarded as Equivalent to the Organic JAS System
(Janualy 2015)

1. Specified Agricultural and Forestry Products
Organic Agricultural Products and Organic Agricultural Processed Foods

2. Name of Countries
the United States of America, Argentina, Australia, Canada, Switzerland, New Zealand, member states of the European Union

※ Japanese importers who are certified by registered certifying body can attach organic JAS logo to specified agricultural and forestry products to which a governmental or quasi-governmental certificate is attached upon the import.

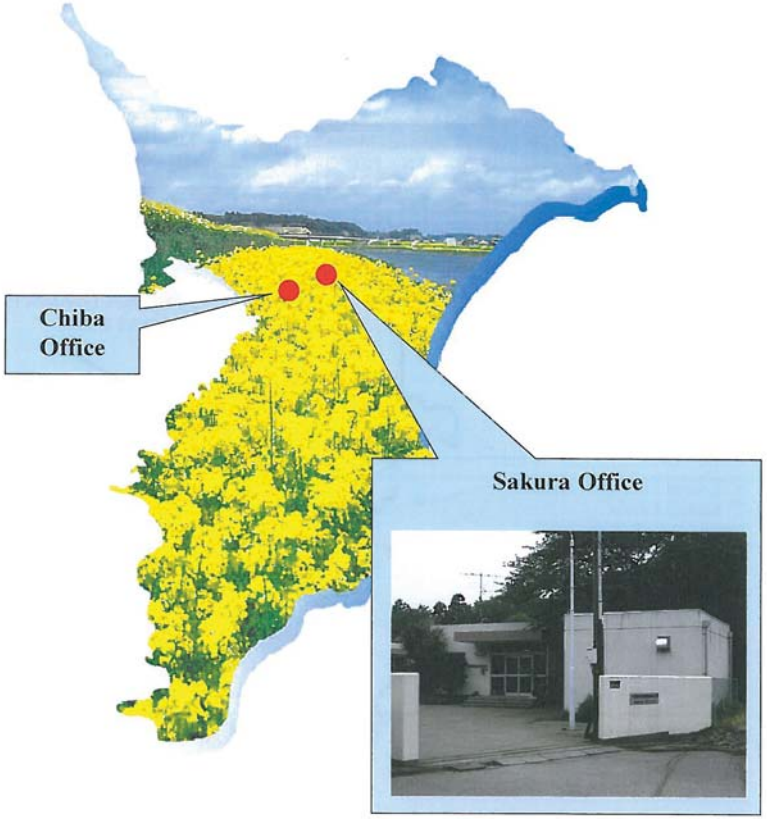
NOTE) Bodies which are recognized as quasi-governmental organizations by the Minister of Agriculture, Forestry and Fisheries are listed in following document.
→ http://www.maff.go.jp/j/jas/jas_kikaku/pdf/shoumeisho_hakkoukikan_130701.pdf

3. List of member states of European Union
Ireland, Italy, the United Kingdom, Estonia, Austria, Netherlands, Cyprus, Greece, Croatia, Sweden, Spain, Slovakia, Slovenia, Czech, Denmark, Germany, Hungary, Finland, France, Bulgaria, Belgium, Poland, Portugal, Malta, Latvia, Lithuania, Romania and Luxembourg

食品の安全を守る仕組み
(Food Safety Risk Analysis)

※ 厚生労働省作成資料より抜粋（平成 29 年 3 月）

Overview

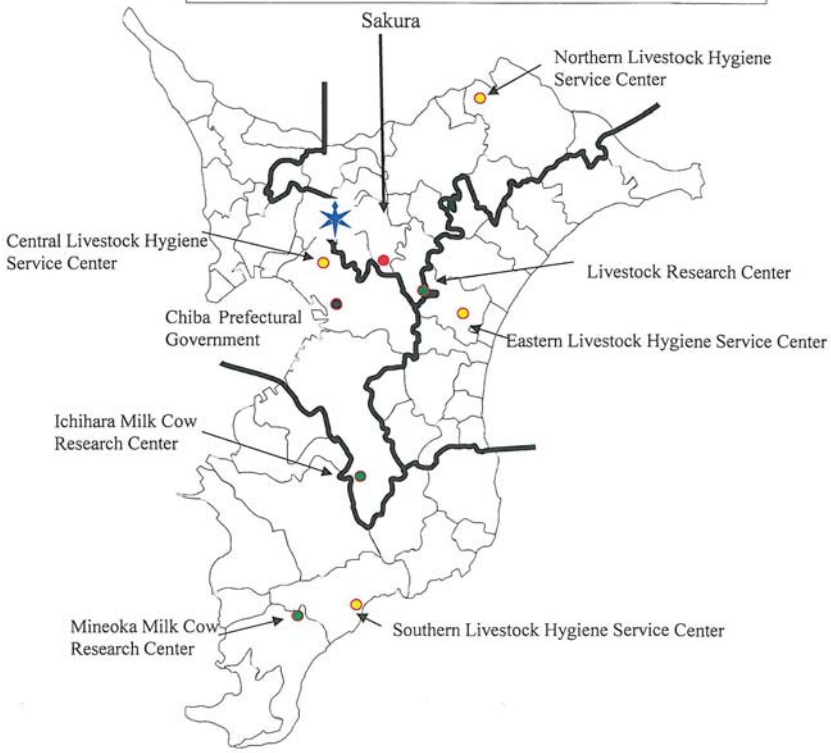


Chiba Prefecture Central Livestock Hygiene Service Center - Sakura

History

- **April 1, 1965**
  An animal pathology division was established in the Central Livestock Hygiene Service Center (Chiba city) as a core livestock hygiene service center.
- **April 1, 1973**
  Due to an increasing demand for a more advanced and specialized livestock hygiene technology, the animal pathology division of the Central Livestock Hygiene Service Center was abolished and the Livestock Health Laboratory was newly established at the present location (Sakura city).
- **April 1, 2001**
  Following an organizational change, the Livestock Health Laboratory was merged with the Central Livestock Hygiene Service Center, and the Sakura office opened two new divisions, the Pathology and Biochemistry Division and the Bacteriology and Virology Division.
- **April 1, 2003**
  The Sakura office started to conduct BSE examinations on dead cattle (aged 24 months and above) based on the Act on Special Measures concerning Measures against Bovine Spongiform Encephalopathy (BSE). (Act No. 70 of 2002)

Distribution of livestock-related facilities in Chiba Prefecture



Organizational Structure and Services

********** [Chiba Office] **********

Director (1 Technical personnel) Deputy director (1 Technical personnel) Senior officer (1 Technical personnel)

- **Administrative Affairs Division** (2 Office clerks)
- **Public Health Guidance Division** (5 Technical personnel)
  Provision of services based on the Act Concerning Livestock Hygiene Service Centers, Pharmaceutical Affairs Act, Act on Improvement and Increased Production of Livestock, Veterinary License Act, and Veterinary Practice Act, as well as services for the dissemination and improvement of livestock hygiene technology.
  Provision of services based on the Act Concerning Safety Assurance and Quality Improvement of Feed, the environmental protection ordinance of Chiba Prefecture, as well as services related to the improvement of animal feeding conditions.
- **Disease Prevention Division** (3 Technical personnel)
  Provision of services based on the Act on Domestic Animal Infectious Disease Control and the Act Concerning Livestock Hygiene Service Centers

********** [Sakura Office] **********

The office undertakes pathological appraisals for acute and chronic diseases of livestock; conducts surveillance to forecast the occurrence and spread of infectious diseases that are important in terms of livestock hygiene and are acting as production limiting factors; carries out quality testing of veterinary drugs in order to ensure the safety of livestock products; conducts tests for drug-resistant bacteria and checks for residue of antibacterial substances in eggs, meat and other livestock products.
Furthermore, the Sakura office has been conducting BSE tests on dead cattle since April 1, 2003, based on the Act on Special Measures concerning Measures against Bovine Spongiform Encephalopathy.
For veterinarians and other persons engaged in livestock hygiene, the office also provides training and seminars regarding new diseases and technologies.

Deputy Director (1 Technical personnel) Senior Officer (1 Technical personnel)

- **Pathology and Biochemistry Division** (5 Technical personnel)
  Introduction, dissemination, and research on pathological, hematological, protozoal, parasitical and biochemical tests, as well as the relevant technology.
- **Bacteriology and Virology Division** (6 Technical personnel)
  Introduction, dissemination, and research on bacteriological, virological and serological tests, as well as the relevant technology.

Sakura Office

The office undertakes pathological appraisals for acute and chronic diseases of livestock; conducts surveillance to forecast the occurrence and spread of infectious diseases that are important in terms of livestock hygiene and are acting as production limiting factors; carries out quality testing of veterinary drugs in order to ensure the safety of livestock products; conducts tests for drug-resistant bacteria and checks for residue of antibacterial substances in eggs, meat and other livestock products.
Furthermore, the Sakura office has been conducting BSE tests on dead cattle since April 1, 2003, based on the Act on Special Measures concerning Measures against Bovine Spongiform Encephalopathy.
For veterinarians and other persons engaged in livestock hygiene, the office also provides training and seminars regarding new diseases and technologies.

Pathology and Biochemistry Division

In addition to undertaking histopathological, hematological, protozoal, parasitical, and biochemical tests, as well as BSE tests, the division conducts livestock hygiene technology training and surveys relevant to those tests.

Bacteriology and Virology Division

In addition to undertaking bacteriological, virological and serological tests, as well as BSE tests, the division conducts technology livestock hygiene technology training and surveys relevant to those tests.

Main services

1 Pathological appraisal

Among all the specimens arriving at the Livestock Hygiene Service Center for pathological appraisal, those requiring detailed and advanced bacteriological, virological, pathological, and biochemical investigation of causal agents will undergo various examinations here.

2 BSE test on dead cattle

BSE tests are carried out on cattle that are found dead on cattle husbandry farms.

Transfer of dead cattle

Medulla oblongata (obex) sample collection

BSE examination laboratory
(Biohazard protection laboratory)

Using safety cabinets to conduct tests

3 Other laboratory tests and services

- ◇ Surveillance of highly pathogenic avian influenza
- ◇ Surveys of the six bovine diseases
- ◇ Crisis management for veterinary drugs
- ◇ Development of emergency disease control measures
- ◇ Improvement of diagnostic and disease prevention technologies
- ◇ Development of local domestic animal infectious disease control systems
- ◇ Forecasting the outbreaks of domestic animal infectious diseases
- ◇ Surveys of porcine epidemic diarrhea and transmissible gastroenteritis of swine
- ◇ Guidance on improvement of safety assurance of feed
- ◇ Measures to achieve disease-free status for specified diseases

4 Disseminating and training livestock hygiene technology

Technical training and seminars

Procedures of BSE test on dead cattle

Procedures at a slaughtering facility

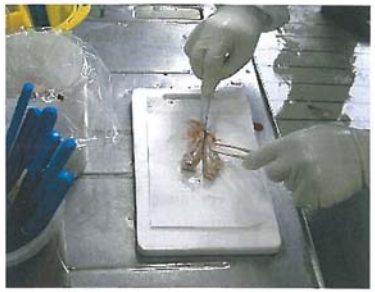
1 Reception of the dead cattle

Transfer the cattle to a container

Transfer the container to the slaughtering facility

2 Collection of test specimens

Collecting the medulla oblongata (obex).



ELISA test. Cutting the specimen vertically for pathological tests.

3 Transfer to and storage in refrigeration facility

Keep under refrigeration until test results are obtained.

Laboratory tests for BSE (ELISA test)

1 Biohazard protection laboratory

Get changed in the preparation room and pass through the air shower to enter the laboratory.

Using safety cabinets to conduct tests

2 ELISA test

BSE Purification Kit

⇒

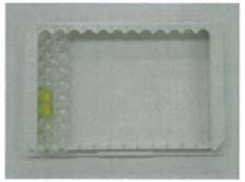
Weighing the specimen of medulla oblongata (obex)

⇒

Extraction of abnormal prions

BSE Test Kit

⇒



Enzyme-antibody reaction (coloration)

⇒

Absorbance determination

Transfer and incineration of the tested cattle

Transferring BSE negative cattle

Incineration

要覧

千葉県中央家畜保健衛生所　千葉庁舎
〒262-0011　千葉市花見川区三角町 656 番地
TEL. 043-250-4141　FAX. 043-286-0090

千葉県中央家畜保健衛生所　佐倉庁舎
〒285-0072　佐倉市岩富町 497 番地
TEL. 043-498-1431　FAX. 043-498-1475

沿革

昭和 40 年 4 月 1 日、東葛飾（柏市）、市原（市原郡五井）の 2 ヵ所を千葉市都町の中央家畜保健衛生所と統合、昭和 45 年 4 月 1 日に千葉市三角町に庁舎を移し現在に至る

昭和 33 年 4 月 1 日	千葉市都町に中央家畜保健衛生所として設置される
昭和 40 年 4 月 1 日	東葛飾（柏市）、市原（市原郡五井）の 2 ヵ所の家畜保健衛生所を併合し、東葛支庁内に駐在を置く
昭和 45 年 4 月 1 日	現在地に新庁舎を建設し移転する
昭和 47 年 3 月 31 日	東葛支庁内駐在を廃止する
昭和 48 年 3 月 31 日	病性鑑定課を家畜衛生研究所に組織換え
昭和 49 年 4 月 1 日	検査課を新設
昭和 51 年 4 月 1 日	検査課を環境指導課に改名
平成 13 年 4 月 1 日	家畜衛生研究所を廃止し、業務は中央家畜保健衛生所に病理生化学課、細菌ｳｲﾙｽ課として統合された
平成 20 年 3 月 31 日	環境指導課を廃止する

概要

千葉県では、中央（千葉市・佐倉市）、東部（東金市）、南部（鴨川市）、北部（香取市）の４ヶ所で県内の家畜衛生業務を行っている。
当所の管轄区域は、千葉及び東葛飾地区の１３市（125,231ha）からなり西北部は東京湾、江戸川、利根川を隔てて東京、埼玉、茨城の各都県と隣接しており、畜産環境保全に対する意識が高い。

当所管内は都市化地域が多く、畜産農家は他所と比較し少なめであるが、大型化が進み都市近郊型農業として発展している。

最近のﾍﾟｯﾄﾌﾞｰﾑを反映し動物用医薬品販売業等（約 248 件）並びに飼養動物診療施設（動物病院）（約 480 件）の開設数は県下の半数を越えており、これらに関わる業務が増加している。

なお、平成 13 年 9 月、病理生化学課において日本で最初に BSE を発見した。

組織構成

- 所長
  - 次長
    - 庶務課　（課長 他１名：事務職）
    - 衛生指導課　（課長 他３名：獣医師）
    - 防疫課　（３名：獣医師）
  - 主幹
  - 次長
    - 細菌ｳｲﾙｽ課　（課長 他５名：獣医師）
    - 病理生化学課　（課長 他４名：獣医師）

所管業務の概要

千葉庁舎

敷地面積	2,445.24 ㎡
庁舎	398.50 ㎡
解剖室	31.36 ㎡
倉庫･車庫	87.03 ㎡
会議室	253.68 ㎡

佐倉庁舎

敷地面積	4,063.00 ㎡
庁舎	711.59 ㎡
（BSE 検査室 49 ㎡を含む）	
生化学病性鑑定棟	126.00 ㎡
BSE 解体処理施設	77.28 ㎡
BSE 冷蔵保管施設	253.68 ㎡
車庫･機械室	72.65 ㎡
ﾌﾟﾚﾊﾌﾞ冷凍冷蔵庫	28.20 ㎡
屋外倉庫	28.35 ㎡
動物舎	28.35 ㎡

主要備品

千葉庁舎

ｴﾗｲｻﾞｰｱﾅﾗｲｻﾞｰ＆ﾘｰﾀﾞｰ、顕微鏡、
実体顕微鏡、純水製造装置、電子天秤、
高速遠心機、電気泳動装置、冷凍庫、
乾熱滅菌器、ｵｰﾄｸﾚｰﾌﾞ、BOD･COD ﾒｰﾀｰ、
自動血球計数機、高圧洗浄器、
発電機付き投光器、煙霧用薬剤噴霧器、
石灰塗布機、動力噴霧器、
画像診断装置、他

佐倉庁舎

超高速遠心機、自動ﾊﾟﾗﾌｨﾝ包埋器
自動染色装置、自動固定包埋装置
高速液体ｸﾛﾏﾄｸﾞﾗﾌ、分光光度計
原子吸光分光光度計、蛍光顕微鏡
自動生化学分析装置、
電子顕微鏡（透過型）、ｻｰﾏﾙｻｲｸﾗｰ、
核酸電気泳動装置、安全キャビネット、
焼却炉、リアルタイム PCR 他

家畜の飼養状況

（2,010 年農業センサスより）

区分	乳用牛		肉用牛		豚		採卵鶏	
	飼養戸数	飼養頭数	飼養戸数	飼養頭数	飼養戸数	飼養頭数	飼養戸数	飼養羽数
千葉県計	**869**	**41 184**	**444**	**36 924**	**317**	**535 568**	**215**	**10 112 000**
管内計	136	6 472	53	854	16	25 800	29	1401 600
千葉地区	95	4 767	30	563	12	25 800	7	1194 300
千葉市	49	2 283	13	240	4	2 335	－	－
習志野市	－	－	－	－	－	－	－	－
市原市	31	1 486	12	283	6	23 465	7	1194 300
八千代市	15	998	5	40	2	x	－	－
東葛飾地区	41	1 705	23	291	4		22	207 300
市川市	－	－	－	－	－	－	1	58 300
船橋市	10	466	3	10	1	x	3	x
松戸市	－	－	－	－	－	－	2	x
野田市	29	1 239	18	281	1	x	7	65 400
柏市	－	－	－	－	2	x	4	83 000
流山市	－	－	－	－	－	－	3	600
我孫子市	－	－	－	－	－	－	2	x
鎌ヶ谷市	2	x	2	x	－	－	－	－
浦安市	－	－	－	－	－	－	－	－

所管業務の概要

千葉庁舎

畜産の安定的振興に寄与するため、家畜衛生思想の普及啓発、情報の収集・広報、動物用医薬品の適正使用に関する指導、家畜伝染病の発生予防及びまん延防止、家畜飼養環境の改善指導を図るとともに、家畜保健衛生上必要な試験・検査及び畜産に関する相談等各種の業務を実施している。

衛生指導課

家畜保健衛生所法、薬事法、家畜改良増殖法、獣医師法等に基づく業務及び家畜衛生指導総合推進事業に関する業務

1 所管区域内の家畜衛生業務の企画調査に関すること
家畜伝染性疾病発生予察事業、特定疾病清浄化対策事業、家畜衛生技術指導事業等による検査・調査・指導を行う。

2 薬事法の施行に関すること(動物のために使用されることが目的の医薬品等)
動物用医薬品販売業許可事務、販売業者等の監視指導を行う。

3 家畜衛生に関する思想の普及及び向上に関すること
家畜の飼養衛生管理基準の遵守状況調査・指導、衛生検査・調査、広報の配布を行う。

4 家畜の改良増殖に関すること
人工授精所開設・人工授精師免許事務、共進会の衛生指導を行う。

5 獣医師法及び獣医療法の施行に関すること
飼育動物診療施設の開設の届出事務、構造設備の指導を行う。

6 市原乳牛研究所入牧牛検査関係業務
入牧牛の衛生検査を行う。

豚の採血検査

飼料の安全性確保及び品質改善に関する法律、家畜排せつ物の管理の適正化及び利用の促進に関する法律、千葉県環境保全条令及び家畜飼養環境改善に関する業務を行う。

1 畜産物の安全性確保に関すること

① 飼料安全性確保に係る指導事業
地区講習会、巡回指導、抗菌性物質残留検査を行う。

② 動物用医薬品危機管理
動物用医薬品の適正使用のため、動物用医薬品の品質検査、薬剤耐性菌の発現状況調査を行う。

③ 緊急性疾病防疫体制整備事業
社会的影響の高い疾病について調査・指導を行う。
広報・巡回指導、サルモネラ菌等の浸潤調査等

④ 動物由来感染症監視体制の整備
社会的に影響度が高い動物由来感染症について、モニタリング検査を実施し、その浸潤状況を把握するとともに、農家に対し衛生指導を行い安全性の高い畜産物の生産供給を図る。

2 畜産環境保全に関すること
畜産環境保全総合対策推進事業
家畜排せつ物の適正な管理及び処理と、たい肥の有効利用を推進する。
畜産環境保全巡回指導、家畜排せつ物処理技術指導及び施設の適正管理指導を行う。

3 畜産の経営指導に関すること
地域畜産総合支援体制整備事業
地域検討会、畜産経営体のサポート(巡回調査・助言・指導)

細菌検査

防　疫　課

家畜伝染病予防法、家畜保健衛生所法及び牛海綿状脳症対策特別措置法に基づく業務

1　家畜伝染病の発生予防に関すること
　牛の結核病、ブルセラ病、ヨーネ病、馬伝染性貧血、豚オーエスキー病、蜜蜂の腐蛆病、高病原性鳥インフルエンザ等の家畜伝染性疾病の検査を行う。

2　家畜の伝染病のまん延防止に関すること
　伝染病発生時の防疫対策、清浄性確認検査などを行う。

3　家畜の病性鑑定に関すること
　病気の原因究明などを行う。

4　死亡牛の届出に関すること
　48ヶ月齢以上の死亡牛の届出の受付けなどを行う。

5　自衛防疫業務の指導に関すること
　1）家畜生産農場清浄化支援対策事業
　　①　オーエスキー病清浄化支援対策
　　②　疾病発生、流行防止対策（ワクチン接種）
　　牛ｱｶﾊﾞﾈ病(生)ﾜｸﾁﾝ、牛ｱｶﾊﾞﾈ・ｱｲﾉ・ﾁｭｳｻﾞﾝ混合(不活化)ﾜｸﾁﾝ、
　　牛伝染性鼻気管炎ﾜｸﾁﾝ　などの接種指導を行う。

　2）特例疾病損耗防止事業（ワクチン接種）
　　豚丹毒ﾜｸﾁﾝ、豚日本脳炎ﾜｸﾁﾝ、豚ﾊﾟﾙﾎﾞｳｲﾙｽ感染症ﾜｸﾁﾝ　などの接種指導を行う。

口蹄疫防疫演習

佐倉庁舎

家畜の急性、慢性伝染病に係る病性鑑定、家畜衛生上重要で生産性阻害要因ともなっている各種伝染性疾病を対象に発生予察や浸潤状況等調査及び畜産物の安全性確保の観点から動物用医薬品の品質検査、耐性菌調査、卵や肉からの抗菌性物質等の残留検査を実施している。

また、平成15年4月1日からは、ＢＳＥ対策特別措置法に基づき死亡牛のＢＳＥ検査を実施している。

その他、家畜衛生に携わる獣医師等を対象に新疾病や新技術等の研修・講習会等を行っている。

病理生化学課

病理組織学的検査、血液学的検査、原虫・寄生虫検査、生化学的検査及びBSE検査並びにこれらの検査に係る家畜衛生技術の研修及び調査等を行う。

細菌ｳｲﾙｽ課

細菌学的検査、ｳｲﾙｽ学的検査、血清学的検査及びBSE検査並びにこれらの検査に係る家畜衛生技術の研修及び調査等を行う。

主　な　業　務

1　病性鑑定事業
　家畜保健衛生所で受付された病性鑑定のうち細菌・ｳｲﾙｽ・病理・生化学の各分野で精密かつ高度な病因検索が必要なものについて各種検査を実施する

2 死亡牛BSE検査
牛飼養農家で死亡した牛のBSE検査を実施する


死亡牛の搬入


延髄(閂部)の採材


BSE検査室
(ﾊﾞｲｵﾊｻﾞｰﾄﾞ対応検査室)


安全キャビネット内で検査

3 調査事業
◇ 家畜伝染病発生予察事業
◇ 牛の五疾病ｻｰﾍﾞﾗﾝｽ抗体調査
◇ 緊急性疾病防疫体制整備事業
◇ 高病原性鳥ｲﾝﾌﾙｴﾝｻﾞｻｰﾍﾞﾗﾝｽ抗体検査
◇ 急性悪性伝染病対策(野鳥のA型 AI ウイルス保有状況調査)
◇ 飼料安全法等に関する監視・指導(抗菌性物質等残留検査)
◇ 慢性疾病等生産性を阻害する疾病の低減
◇ 診断予防技術の向上
◇ 動物用医薬品危機管理対策事業
◇ 鳥インフルエンザモニタリング調査
◇ 特定疾病清浄化対策事業
◇ 動物由来感染症監視体制の整備

4 家畜衛生技術の普及・指導
技術研修会、講習会

中央家畜保健衛生所 交通案内図

千葉庁舎

中央家畜保健衛生所
〒262-0011 千葉市花見川区三角町 656 番地
TEL. 043-250-4141 FAX. 043-286-0090

京成勝田台から 京成バス
こてはし団地行き(勝 01)→こてはし第一下車 徒歩 15 分
ｽﾎﾟｰﾂｾﾝﾀｰ駅行き(勝 22)→積橋高校入口下車 徒歩 18 分

JR 新検見川駅から 京成バス
こてはし団地行き (検 22) ——→三角町下車 徒歩 10 分
いきいきﾌﾟﾗｻ・草野車庫行き (検 21)
→積橋中学下車 徒歩 3 分

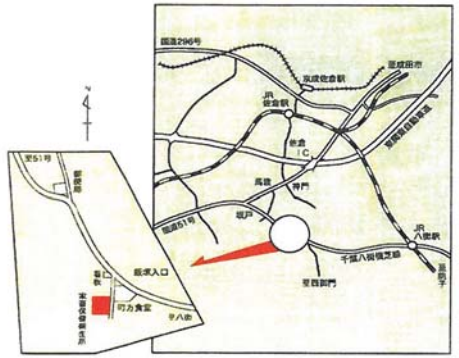
JR 稲毛駅から 京成バス
こてはし団地行き(稲 02)→積橋高校入口下車 徒歩 18 分

京成八千代台駅から 京成バス
いきいきﾌﾟﾗｻﾞ行き(八千 11)→積橋中学下車
徒歩 3 分

JR千葉駅から モノレール
千城台行き →ｽﾎﾟｰﾂｾﾝﾀｰ下車
京成勝田台行き (バス) →積橋高校入口下車 徒歩 10 分

佐倉庁舎

中央家畜保健衛生所 病理生化学課・細菌ｳｲﾙｽ課
〒285-0072 佐倉市岩富町 497 番地
TEL. 043-498-1431 FAX. 043-498-1475



千葉県家畜保健衛生所　配置図

千葉県の主な畜産関係機関　配置図

Center Handbook

Toubu Livestock Hygiene Service Center, Chiba Prefecture

1965-2 Kaxxba, Togane 283-0064, Japan
Tel 0475-52-4101 Fax 0475-52-3335

website
http://www.pref.chiba.lg.jp/nourinsui/kaho/toubu/index.html

The District

- This Center is located in Togane City in the eastern part of Chiba prefecture. The district consists mainly of rice fields stretching over the flat Kujukuri plains and runs north to south from the Shimousa plateau to Kazusa hill. The Kujukuri-hama shore facing the Pacific has many swimming and resort facilities. The beaches attract great many tourists during the high season.

- The administrative area consists of six cities, nine towns, and one village in the Kaisou, Sanbu, and Chosei regions. The total area is 1,070.2 km2, which is 20% of Chiba prefecture.

- This district is one of the largest stock farming areas. According to agricultural and forestry statistics from February 2007, livestock owned is as follows - dairy cattle: 245 farms, 10,640 cattle / meat cattle: 132 farms, 18,550 cattle / pork pigs: 222 farms, 294,610 pigs / egg laying chickens: 75 farms, 4,122,000 chickens.

- In 1968, an organization for protection from and prevention of epidemics, the Toubu Association for Prevention of Infectious Pig Disease, was formed in this district ahead of other regions in Japan, and contributed to disseminating the ideas of epidemic protection and prevention, as well as promoted vaccinations.

Outline of Services (1)

- Our services includes inspections and surveys, aiming to prevent infectious livestock diseases, and the spreading of the sound development of livestock. The Center also offers guidance and advice concerning safe livestock farming and improvement of environmental preservation, instructions for appropriate use of medicine for animals, and pharmaceutical monitoring.

- Hygiene Guidance Section

- **Guidance for livestock hygiene**

- The Center provides information about hygiene by visiting stock farmers and publishing PR brochures, and offers guidance to improve skills to maintain hygiene. In particular for diseases that have great economic impact, the Center conducts tests and provides guidance for vaccination programs and measures against these diseases. The Center also continuously monitors the status of the permeation and movement of infectious livestock diseases that may begin to spread, puts epidemic prevention systems in place based on that information, and provides guidance for stock farmers.

Outline of Services (2)

- Hygiene Guidance Section
- **Guidance for improvement of livestock**
- This section conducts livestock breeding inspections and issues licenses for livestock fertilization.
- **Appropriate use of medicine for animals**
- This section carries out administrative work for issuing permits to animal medicine distributors, conducts pharmaceutical monitoring, and provides guidance concerning appropriate distribution of medicine for animals.
- **Development of veterinary medicine systems**
- This section carries out permit issuing work for things such as opening and closing of animal clinics, and conducts on-site inspections.
- **Ensuring safety of stock farm products**
- This section performs inspections for infiltration of such things as salmonella, O-157 and cryptosporidium, residual feed additive and resistant bacteria inspections, and provides guidance for farmers to ensure safe stock farming.
- **Livestock environmental preservation**
- This section checks on the improvement of stock excrement processing facilities and their usage status, and provides advice and guidance to farmers so that they can continue to process it appropriately. This section also works with related organizations to provide guidance for making improvements in areas regarding complaints about environmental pollution involving stock farming, and bolsters stock farming so they are able to work in harmony with local communities.

Outline of Services (3)

- Disease Prevention Section
- Testing for infectious diseases that must be monitored
- This section conducts tests for bovine tuberculosis, brucellosis, Johne's disease–paratuberculosis, equine infectious anemia, classical swine fever, pseudorabies, high pathogenic avian influenza, and bee foul brood, and so on. It verifies hygiene maintenance, and carries out disclosure and curtailment.
- Assessment of diseases
- This section, upon stock farmers' requests, conducts various inspections to identify the causes of infectious diseases, and strives to prevent the spread of diseases.
- Export and import stock inspection
- This section conducts clinical tests and specific disease tests on imported livestock for three months after they enter Japan, and works to prevent diseases coming from overseas.

Access

By Public Transportation

From the west exit of **Togane** Station,
JR Togane Line
(Approx. 45 mins. from Chiba Station)

At Kujukuri bus stand #2, take any bus bound for **Sun Rise Kujukuri / Shirasato or Katakai Station on Toyoumi Line**, and get off the bus at the **Kimigaya stop**.

By Car

From Chiba, take Route 126 (Togane Bypass), turn right at the Toyoumi prefectural road junction, and drive approx. 80 meters.

Turn left at the Kujukuri bus stop (Kimigaya), and the Center is located behind Nanso Transport Inc.

要　覧

千葉県東部家畜保健衛生所

〒283-0064　東金市川場1105－3
Tel　0475-52-4101　Fax　0475-52-3335

ホームページ
http://www.pref.chiba.lg.jp/nourinsui/kaho/toubu/index.html

管区の概要

- 当所は千葉県東部の東金市に位置しています。管区は下総台地から上総丘陵にかけた、南北に長く地形平坦な九十九里平野に広がる水田地帯が主体で、太平洋に臨んだ九十九里浜は海水浴や保養を目的とした施設が多く、シーズンには行楽客で賑わいます。

- 行政区域としては海匝・山武・長生地域の６市９町１村からなり、総面積は１，０７０．２ｋｍ２と千葉県全体の２０％を占めています。

- 管内は県下でも有数の畜産地帯であり、平成１９年２月の農林統計によると、乳用牛２４５戸１０，６４０頭、肉用牛１３２戸１８，５５０頭、豚２２２戸２９４，６１０頭、採卵鶏７５戸４１２万羽が飼養されています。

- また、当管内において、全国に先駆けて自衛防疫組織である「東部豚伝染病予防会」が設立（昭和４３年）され、自衛防疫思想の普及と予防注射接種の促進に寄与した地域でもあります。

業務の概要(1)

- 畜産の健全な発展のため、家畜伝染病の発生予防とまん延防止を目的とした検査・調査を実施するとともに、安全な畜産物の生産や環境保全の向上に関する指導・助言、動物用医薬品適正使用への指導と薬事監視等を実施しています。

- 「衛生指導課」
- **家畜衛生指導**
- 畜産農家巡回や広報の発行により衛生情報の提供や衛生技術向上の指導をしています。特に経済的被害の大きい疾病については検査を実施し、ワクチンプログラムや疾病対策について指導しています。また、流行の恐れのある家畜伝染病の浸潤状況と動態を継続的に予察し、それを基にした防疫体制の確立と畜産農家への指導を行っています。

業務の概要(2)

- 「衛生指導課」
- **家畜改良指導**
- 種畜検査や家畜人工授精師の免許証交付を実施しています。
- **動物用医薬品の適正使用**
- 動物用医薬品販売業者に対する許可事務と薬事監視を実施し、動物用医薬品の適正流通について指導しています。
- **獣医療体制の整備**
- 飼育動物診療施設の開設・廃止等の届出事務や現地調査を実施しています。
- **畜産物の安全性確保**
- サルモネラ、O－157、クリプトスポリジウム等の浸潤調査や、飼料添加物残留検査、耐性菌検査等を実施し、安全性の高い畜産物の生産について農家指導を行っています。
- **畜産環境保全**
- 家畜糞尿処理施設の整備とその利用状況の把握し、適切な処理を継続できるように農家に助言・指導を実施しています。また、畜産経営に伴う環境汚染問題の苦情等についても関係機関と協力して改善指導を実施し、地域と共生する畜産経営の確立を進めています。

業務の概要(3)

- 「防疫課」
- 監視伝染病の検査
- 牛結核病 ブルセラ病 ヨーネ病 馬伝染性貧血 豚コレラ 豚オーエスキー病 高病原性鳥インフルエンザ 蜜蜂のふそ病 等について検査を行い、清浄性維持の確認や摘発・とう汰を実施しています。
- 病性鑑定
- 畜産農家等の依頼により、伝染性疾病を中心に原因究明のため各種検査を実施し、疾病のまん延防止に努めています。
- 輸出入家畜検査
- 輸入家畜について、着地後3ヶ月の間臨床検査と特定疾病検査を実施し、海外からの疾病の侵入防止に努めています。

アクセス

公共交通機関利用

JR東金線　東金駅 西口下車
（千葉駅から約45分）

九十九里バス　2番乗り場　豊海線「サンライズ九十九里・白里行」「片貝駅行」 君ヶ谷 下車

自動車利用

千葉方面より　国道126号線（東金バイパス）豊海県道入口交差点を右折　約80m

九十九里バス停留所（君ヶ谷）前を左折する(回転寿司）銚子丸 裏手

高病原性鳥インフルエンザ対策（平常時）

平成２９年６月９日
中央家畜保健衛生所

１　発生情報の提供について

国内及び近隣諸国における発生情報を、家きん飼養者及び関係機関に、リーフレット（衛生だより）や電子メールなどで周知することにより、関係者の防疫意識向上を図っています。

なお、２８年度については、中央家畜保健衛生所だけで延べ２６回鳥インフルエンザに関する衛生だよりを発行し、情報提供及び注意喚起を行っています。

２　農場内への病原体侵入防止について

畜主自らが農場内への病原体侵入防止を図るため、出入りする人や車の消毒、農場内入場制限及び家畜の健康観察等の飼養衛生管理基準の遵守を徹底するよう、年１回以上農場に立ち入り、指導をしています。

３　異常家きんの届出の徹底について

異常家きんの早期把握のため、家きん飼養者に対して、毎週の死亡羽数報告と異常家きん発見の際の速やかな届出を周知徹底しています。

４　モニタリングの実施について

採卵養鶏場１２農場について、毎月１回、高病原性鳥インフルエンザのモニタリング検査を実施しています。

さらに、発生の恐れが高い１０月から５月の期間、家きんを飼育する３２農場について、高病原性鳥インフルエンザのモニタリング検査を強化しています。

加えて、本県へのウイルスの侵入状況を把握するため、１０月から３月まで、県内湖沼における渡り鳥のウイルス保有状況調査を実施しており、平成１８年１月から現在までに、延べ６，６８４検体の検査を実施しています。

なお、今までに高病原性は、２６年１１月１８日にＨ５Ｎ８亜型を２株分離しています。

５　発生があった場合の職員の動員体制について

県内で、高病原性鳥インフルエンザの発生があった場合、毎年年度当初に整備している「現地防疫作業従事者動員名簿（１，０００人）」をもとに、発生現地で防疫活動に従事していただく職員の動員体制を整えています。

６　現地防疫作業従事者の演習等について

農場における鶏の処分（鶏の取り出し、炭酸ガス注入、容器詰め替え、計数・記録、搬出）、焼埋却処分、農場内消毒等の作業に従事していただくため、毎年作業従事者を対象に県域の防疫演習を実施しています。

昨年度の防疫演習では、防疫活動の際のリーダー、サブリーダー、作業班長の育成のための演習も併せて実施しました。

なお、地域においても、各家畜保健衛生所が現地対策本部員を対象に防疫演習を実施しています。

また、万一の発生に備え、６万羽規模で４か所まで対応可能な防疫資材・機材を備蓄し、毎年必要物資の補充や更新を行っています。

Outline of Actions to Be Taken in the Case of Occurrence of Highly Pathogenic Avian Influenza

I. Actions to Be Taken when a Suspected Case Occurs

1. Actions to be taken by the Livestock Hygiene Service Office

(1) A livestock disease prevention and control officer visits the concerned farm immediately and carries out on-the-spot inspection in order to verify the symptoms, when an abnormality is notified or reported.

(2) The officer notifies the Livestock Hygiene Service Office immediately, as well as collects samples for the disease diagnosis from the chicken with abnormal condition or dead poultry, and sends the samples to the Central Livestock Hygiene Service Office in Sakura City, if infection is suspected judging from the clinical conditions.

(3) The Livestock Hygiene Service Office reports on the general information about the farm to the Livestock Industry Division.

(4) The farm is requested to refrain from transferring any livestock.

2. Actions by the Central Livestock Hygiene Service Office (Sakura City)

Disease diagnosis should be carried out based on the national guidelines for the disease prevention and control. Influenza-A antigen detection procedures are performed as required.

* The Central Livestock Hygiene Service Office in Sakura City is a special institution for the disease diagnosis.

3. Actions by the Livestock Industry Division

(1) Reporting of the occurrence of suspected case of highly pathogenic avian influenza to the Executive Director of Agriculture, Forestry, and Fisheries Department and Prefectural Governor

(2) Notifying to the national government as well as each Livestock Hygiene Service Office

(3) Preparation of disease prevention and control measure and situating task force

II. Actions to Be Taken when a Suspected Pathogenic Virus Is Isolated

1. Actions by the Central Livestock Hygiene Service Office (Sakura City)

It should be reported to the Livestock Industry Division as well as each Livestock Hygiene Service Office that a suspected pathogenic virus has been isolated (or that the disease has possibly been detected due to the occurrence situation of abnormal poultry

as well as a result of more detailed examination) then samples for the disease diagnosis and the allantoic fluid of growing eggs are collected and sent to the National Institute of Animal Health.

2. Actions by the Livestock Industry Division

(1) Reporting to the national government and the neighboring prefectures

(2) Reporting to the officer of the Chiba Livestock Disease Prevention and Control Task Force

(3) Discussions concerning setting up of livestock transfer restriction area with the national government

(4) Announcement to the press in cooperation with the national government

3. Actions by each local Livestock Hygiene Service Office

(1) Reporting to the farm where the abnormal poultry was found as well as farms within the livestock transfer restriction area

(2) An order for cooperation with the city, town or village where the farm with the abnormal poultry is located

(3) Selection and reporting of the disinfection area

152

III. Actions to Be Taken in Case of Definitive Diagnosis of the Diseased Livestock

1. The Livestock Industry Division received the result of definitive diagnosis from the National Institute of Animal Health notifies the result to the chief of the local Livestock Hygiene Service Office as well as the chief of the Central Livestock Hygiene Service Center. The chief of the local Livestock Hygiene Service Office determines that the livestock is infected.

2. Actions by the Livestock Industry Division

(1) Reporting to the national government

(2) Reporting to the Executive Director of Agriculture, Forestry, and Fisheries Department and the Prefectural Governor

(3) Notifying to the neighboring prefectures

(4) Announcement of the disease occurrence and the livestock transfer restriction

(5) Establishment of the disinfection area (setting up of checkpoints on trunk roads in the disinfection area)

3. Actions by the local Livestock Hygiene Service Office

(1) Reporting of the disease occurrence to the city, village or town as well as organizations related to livestock industry

(2) Selection of the livestock according to national guidelines for the diseased livestock, suspected livestock and livestock that could be potentially infected

(3) Instruction to the farms involved to separate the diseased livestock, suspected livestock and livestock that could be potentially infected

(4) Instruction to the farms to dispose the livestock and contaminated materials

(5) Instruction of farm disinfection

(6) Cooperating with the Livestock Industry Division, carry out epidemiological investigations to detect the cause as well as clarification of infection route

4. Establishment of the Chiba Task Force

5. Actions by the Local Task Force

Establishment within the local Livestock Hygiene Service Office of a Local Task Force, whose chief is the chief of the Livestock Hygiene Service Office

[Organizational Structure of the Local Task Force]

1) Section for Public Relations:
Supervising work, liaison coordination, and measures for livestock producers

2) Section for Disease Diagnosis:
Collection and sending of inspection samples, epidemiological research

3) Section for the Area of Occurrence:
Collection of information about the epidemiology, confirmation of the number of dead chickens

4) Section for Evaluation:
Evaluation of the disposed chickens and the cost of the losses accompanying the transfer restriction

5) Section for Disposal:
Disposal of the chickens

6) Section for Incineration/Burial:
Incineration or burial of the disposed chickens and contaminated materials

7) Section for Disinfection:
Disinfection of the farm where the disease occurred

8) Section for Medical Examinations:
Research on the occurrence situation on farms and confirmation of hygiene measures within the transfer restriction area

9) Section for Investigations:
Research on the epidemiology

10) Section for Transfer Restriction:
Disinfection of vehicles used for livestock industry at the disinfection area

6. Ensuring the safety of local operators

The Chiba Task Force and local task forces communicate with the Health and Welfare Department in order to secure the safety of local operators.

IV. Actions to Be Taken for the Livestock Disease Prevention and Control with respect to the Infected Farm and Farms in General

1. Actions with respect to the concerned farm

(1) Disposal of the livestock suspected to be infected (order form of the disposal by the prefectural governor): evaluation of the target chickens before the disposal

(2) Incineration/burial of the carcasses of the suspected chickens

(3) Incineration, burial or disinfection of contaminated materials

(4) Disinfection of the infected barn

2. Transfer restriction

(1) Establishment of the area to be covered and the period together with Animal Health Division

(2) Prohibition of material transfer that could spread the pathogen, such as live poultry, carcasses, eggs, incubation equipment, feedings, and fecal matter within the transfer restriction area

(3) The temporary closure of avian slaughterhouses, GP centers, and incubators

(4) Suspension of livestock fairs where animals are congregated

3. Examination for the confirmation of hygiene conditions

(1) Examination of the transfer restriction area and area where taking livestock out is regulated

i) Research on the occurrence situation

According to on-the-spot inspection of farms within the transfer restriction area, carrying out of the laboratory test of the poultry, and virus isolation and serum antibody inspections of the live or dead poultry.

ii) Inspection of the confirmation of the hygiene conditions

Perform the same inspection as in item i) about 10 days after the preventive/control measures have been carried out concerning the last occurrence

(2) Inspection after the cancellation of transfer restriction (for 3 months as a rule)

(3) Inspection in order to re-operation of the concerned farm

IX. Cancellation of the Transfer Restriction

The Livestock Industry Division assesses the absence of the disease subsequent to the occurrence and the confirmation of the hygiene conditions, and cancels the transfer restriction with the Animal Health Division.

高病原性鳥インフルエンザ発生時の対応の概要

（2009年9月3日作成）

Ⅰ　本病を疑う異常を示した家きんの発生時の対応

1　家畜保健衛生所の対応

（1）家畜防疫員は、異常鶏の通報・届出を受けたとき、直ちにした農場に立ち入り、臨床症状等を確認する。

（2）家畜防疫員は、臨床症状等から本病の感染が疑われる場合は、直ちに家畜保健衛生所へ連絡するとともに、異常鶏及び死亡家きん等から病性鑑定材料を採取し、中央家畜保健衛生所（佐倉）に搬送する。

（3）家畜保健衛生所は、農場の概況等を畜産課へ報告する。

（4）農家に移動の自粛を要請する。

2　中央家畜保健衛生所（佐倉）の対応

国の防疫指針に基づき本病の病性鑑定を行い、必要に応じてA型インフルエンザウイルスの抗原検出検査を実施する。

※中央家畜保健衛生所（佐倉）は、病性鑑定の専門施設

3　畜産課の対応

（1）高病原性鳥インフルエンザ感染を疑う事例が発生したことを県農林水産部長・知事へ報告

（2）国へ連絡及び各家畜保健衛生所へ連絡

（3）防疫対応の準備、対策本部の設置準備

Ⅱ　本病を疑うウイルスが分離された場合の対応

1　中央家畜保健衛生所（佐倉）の対応

本病を疑うウイルスが分離された（又は、異常家きんの発生状況、補助的検査により本病が疑われる）ことを畜産課及び現地家畜保健衛生所へ報告し、独立行政法人動物衛生研究所へ病性鑑定材料及び発育鶏卵の尿膜腔液を搬送する。

2　畜産課の対応

（1）国へ連絡、隣接県等へ連絡

（2）県防疫対策本部構成員等への連絡

（3）国と移動制限区域の設定等について協議を行う。

（4）国と連携して、報道機関等へ公表する。

3　現地家畜保健衛生所の対応

（1）異常鶏発生農場及び移動制限予定区域内の農場への連絡等

（2）異常鶏発生農場が所在する市町村への協力要請

（3）消毒ポイントの選定・報告

Ⅲ　本病の患畜と決定された場合の対応

1　動物衛生研究所からの通知を受けた畜産課は，現地家畜保健衛生所長及び中央家畜保健衛生所長へ連絡する。現地家畜保健衛生所長は、本病の患畜と決定する。

2　畜産課の対応

（1）国へ報告

（2）農林水産部長・知事へ報告

（3）隣接県等へ通報

（4）発生の告示、移動制限の告示

（5）消毒ポイントの設定　（幹線道路等の消毒ポイントの設置場所）

3　現地家畜保健衛生所の対応

（1）市町村及び畜産関係者等に本病が発生したことを通報する。

（2）国指針に基づく患畜、疑似患畜及びおそれ畜を決定する。

（3）患畜、疑似患畜及びおそれ畜の隔離を発生農場に指示する。

（4）殺処分、汚染物品等の処分を発生農場に指示する。

（5）発生農場の消毒を指示する。

（6）畜産課と連携し、原因究明や感染経路の解明のための疫学調査を実施する。

4　県対策本部の立ち上げ

5　現地対策本部の対応

現地家畜保健衛生所内に、家畜保健衛生所長を本部長とする現地対策本部を設置する。

〔現地対策本部の構成〕

①総務広報係	総括業務・連絡調整，生産者対策
②病性鑑定係	検査材料の採材・送付　疫学調査
③発生地係	疫学情報の収集、死亡羽数の確認
④評価係	殺処分鶏の評価、移動制限に伴う売上げ減少額等の評価
⑤殺処分係	殺処分
⑥焼却・埋却係	殺処分鶏・汚染物品の焼却・埋却
⑦消毒係	発生農場の消毒
⑧検診係	移動制限区域内農家の発生状況調査・清浄性確認検査
⑨追跡係	疫学調査
⑩移動規制係	消毒ポイントで畜産関係車両の消毒

6　現地作業従事者に対する安全確保

県対策本部及び現地対策本部は健康福祉部と連携を取り、現地作業従事者の安全性を確保する。

Ⅳ　発生農場及び一般農場の防疫対応等

1　発生農場の防疫対応

（1）疑似患畜の殺処分（知事の殺処分命令書）　　殺処分前に対象鶏の評価

（2）疑似患畜の死体の焼却・埋却

（3）汚染物品の焼却・埋却・消毒

（4）発生畜舎等の消毒

2　移動の制限

（1）範囲・期間は、動物衛生課と協議の上、設定する。

（2）移動制限区域内の生きた家きん、死亡した家きん、卵、飼養管理器材、飼料及びふん等の本病の病原体を広げるおそれのある物品の移動を禁止する。

（3）移動制限区域内の食鳥処理場、ＧＰセンター及びふ卵場は、一時閉鎖する。

（4）品評会などの家きんを集合させる催し物等の開催を停止する。

3　清浄性の確認のための検査

（1）移動制限区域及び搬出制限区域における検査

ア　発生状況調査

移動制限区域内農家の立入検査により、家きん等の臨床検査、家きん等又は死亡した家きん等のウイルス分離検査及び血清抗体検査を行う。

清浄性確認検査

最終発生に係る防疫措置の完了後おおむね１０日目以降アと同様の検査を行う。

（2）移動制限解除後の検査（原則３か月間）

（3）発生農場の経営再開のための検査

Ⅸ　移動制限の解除

畜産課は、発生状況や清浄性の確認状況等を勘案して本病の終息を判断し、動物衛生課と協議の上、移動制限を解除する。