

## FINDING OF EMERGENCY

The Secretary of the California Department of Food and Agriculture (the Department) determined that an emergency exists; infestations of the Huanglongbing (HLB) disease (HLB associated bacteria *Candidatus Liberibacter asiaticus*), have been detected in multiple counties and new counties in California. The Department is proposing an emergency amendment of California Code of Regulations (CCR) Section 3439, the effect of which will be to allow an administratively defined regional quarantine.

### Emergency Defined

‘Emergency’ means a situation that calls for immediate action to avoid serious harm to the public peace, health, safety, or general welfare,” Government Code Section 11342.545. If a state agency makes a finding that the adoption of a regulation is necessary to address an emergency, the regulation may be adopted as an emergency regulation. Government Code Section 11346.1(b)(1).

In this document, the Department is providing the necessary specific facts demonstrating the existence of an emergency and the need for immediate action to prevent serious harm to the general welfare of the citizens of California, pursuant to Government Code Section 11346.1(b)(2).

Government Code Section 11346.1(a)(2) requires that, at least five working days prior to submission of the proposed emergency action to the Office of Administrative Law, the adopting agency provide a notice of the proposed emergency action to every person who has filed a request for notice of regulatory action with the agency.

Government Code Section 11346.1(a)(3) provides that if the emergency situation clearly poses such an immediate, serious harm that delaying action to allow public comment would be inconsistent with the public interest, an agency is not required to provide notice pursuant to Government Code Section 11346.1(a)(2). The Secretary believes that this emergency—in light of new scientific evidence presented in the November 22, 2017 UC and USDA briefing paper on

the Asian Citrus Psyllid (ACP)/HLB invasion of California--clearly poses such an immediate, serious harm that delaying action to give the notice pursuant to Government Code Section 11346.1(a)(2) would be inconsistent with the public interest, within the meaning of Government Code Section 11349.6(b).

The purpose of CCR Section 3439 is to prevent the artificial spread of HLB to uninfested areas. Preventing the artificial spread of HLB, especially long-distance artificial spread, is a key component of controlling the disease. For example, the Florida Department of Agriculture and Consumer Services chose not to attempt to control the artificial spread of the vector of HLB when it appeared in 2005. Consequently, when HLB was introduced in Florida, it swept through the state, which led to the infestation of the entire state. The HLB disease has a latency period of up to two years, during which existing laboratory testing procedures are unable to detect the disease. Although the Department has and continues to conduct extensive surveys for HLB, the disease is still present in California. If HLB-infested plants and the vector (ACP) are successfully prevented from moving from the area of infestation, then further spread of the disease will be prevented.

An emergency statewide quarantine for ACP became effective on January 1, 2018, CCR Section 3435. That quarantine provides authority for the State to perform statewide quarantine activities against ACP. To prevent the artificial transmission of ACP, CCR Section 3435 restricts the movement of ACP-host nursery stock between three regional quarantine zones and bulk citrus between seven regional quarantine zones. Amending CCR Section 3439 to allow administrative quarantines of HLB-infested areas will aid the prevention of the ACP/HLB complex spreading.

Each day that this quarantine amendment is not in place increases the odds that artificial spread of HLB will occur unabated. If HLB is in the new area at undetectable levels, then the ACP/HLB complex will be able to begin its devastating destruction in that area.

During 2012, HLB was first detected in California, and now portions of Los Angeles, Orange, Riverside, and San Bernardino counties are under quarantine for HLB. HLB detections, including the detection of HLB-infected ACPs, have increased significantly in some of these areas over the

past ten months. HLB can remain at sub-detectable levels in trees for up to five years. Consequently, the level of risk for the artificial movement of HLB within the large contiguous quarantine areas in southern California and between non-contiguous quarantine areas in other parts of the state is higher now than it was in 2008, when ACP was originally detected, due to the uncertain distribution of HLB within the state.

Providing five days advance notice of an emergency rulemaking to interested parties delays implementation of this amended quarantine by an additional eight to ten days. In August 2017, there was a find of an HLB-positive ACP in a new county, San Bernardino. Although this does not trigger a quarantine, the finding of an associated positive tree is likely and that would trigger a quarantine. Any delay in implementing the quarantine decreases the Department's ability to prevent long distance artificial spread of HLB after any new detection, including the spread of HLB to other areas of the Central Valley's major citrus production area.

The information contained within this finding of emergency meets the requirements of Government Code Sections 11346.1 and 11346.5.

The Secretary is proposing to amend CCR Section 3439 pursuant to the authority in Food and Agricultural Code (FAC) Section 403 ("the department shall prevent the introduction and spread of injurious insect or animal pests, plant diseases, and noxious weeds"), Section 407 ("the director may adopt such regulations as are reasonably necessary to carry out the provisions of this code which he is directed or authorized to administer or enforce"), and Section 5322 ("the director may establish, maintain, and enforce quarantine, eradication, and such other regulations as are in his or her opinion necessary to circumscribe and exterminate or prevent the spread of any pest which is described in Section 5321").

Additionally, FAC Section 401.5 states: "The department shall also seek to enhance, protect, and perpetuate the ability of the private sector to produce food and fiber in a way that benefits the general welfare and economy of the state."

## California Environmental Quality Act

An increase in HLB detections, transmission rates, and nymph detections, as revealed by the November 22, 2017 University of California (UC) and United States Department of Agriculture (USDA) briefing paper, represent an exponential intensification of the HLB epidemic, and immediate action is now required to address the imminent threat to California's natural environment, agriculture and economy. The November 22, 2017 briefing paper characterizes the need for redefined quarantine zones as a matter of "utmost urgency," which requires an "immediate regulatory response." By threatening citrus, the intensification of the HLB epidemic jeopardizes an industry that is worth approximately \$2.26 billion, comprises 46 percent of annual U.S. citrus production, 62 percent of annual U.S. citrus value, and provides 25,000 jobs in the State (USDA Citrus Fruits 2017 Summary; California Agricultural Statistics Review 2016 – 2017, pg. 54; Section 5911 of the Food and Agricultural Code). In addition to citrus, the HLB/ACP complex threatens loss and damage to native wildlife, private and public property, and food supplies. A more efficient and expeditious means of adjusting quarantine boundaries is needed immediately. Therefore, the Secretary is invoking Public Resources Code Section 21080(b)(4) to carry out immediate emergency action to prevent this loss and damage.

## Evidence of an Emergency

By itself, ACP causes only minor cosmetic damage to citrus trees. However, when ACP becomes infected with HLB, it becomes a carrier for the disease and can transmit the HLB-associated bacteria from the fourth nymphal instar through the adult stage with a latency period as short as one day or as long as 25 days. HLB was first identified in China in 1919 and is considered the most devastating of all citrus diseases. Once infected, there is no cure for HLB-infected citrus trees, which decline and die within a few years. Additionally, the fruit produced by infected trees is not suitable for either the fresh market or juice processing due to the significant increase in acidity and bitter taste.

Both ACP and HLB are federal-action quarantine pests subject to interstate and international quarantine restrictions by the USDA. Both ACP and HLB occur in Mexico, and HLB has continued to spread to the north and now occurs south of the State of Sonora. In mid-January 2012, HLB was confirmed in the Rio Grande Valley in Texas. Additionally, in July 2009, ACP

nymphs were intercepted in a plant shipment from India sent to the Fresno area, and the nymphs tested positive for HLB. On March 30, 2012, the USDA confirmed the presence of HLB in the Hacienda Heights area of Los Angeles County and the only known infected tree was removed. However, the Department established a HLB Interior Quarantine of approximately 93 square miles surrounding the find site. Additionally, on July 9, 2015, the USDA confirmed the presence of HLB in the San Gabriel area of Los Angeles County. On December 29, 2016, the USDA confirmed the presence of additional HLB in Los Angeles and Orange counties. On July 25, 2017, HLB was present in Riverside County. ACP was first detected in California in 2008 in San Diego and has since spread north as far as Placer County. Note that, in northern California, even counties with only a few ACP detections – for example Santa Clara County – may still have relatively high-risk levels because of population census data that indicate the background risk of infected citrus in private yards is relatively high.

It is imperative that the Department prevent the artificial spread of HLB wherever possible to ensure the devastating damage caused by HLB is limited to the smallest area possible. An economic analysis study by the University of Florida IFAS Extension concluded that, after its introduction in Florida, HLB had a total negative impact of \$3.64 billion and eliminated 0.08 percent of the total Florida workforce.

California is the number one economic citrus state in the nation. The USDA's Citrus Fruits 2017 Summary puts the value of citrus at \$2.26 billion (pg. 8). In 2016, California accounted for over 46 percent of US citrus production and 62 percent on the national value (California Agricultural Statistics Review, 2016-17; pg 54). To protect the source of this economic activity, California must do everything possible to exclude both HLB-associated pathogens and ACP from the state.

On November 22, 2017, UC and the USDA provided the Department a briefing paper that provided new scientific evidence and analysis indicating that a statewide emergency exists. The following information from the briefing paper supports the conclusion that there is a clear, imminent, and statewide danger to California's natural environmental, agriculture, and economy due to HLB.:

Since 2012, a background risk level for HLB in residential citrus in each square mile of interest has been calculated 2-3 times per year using a risk model developed in Florida and adopted for use in California by Dr. Tim Gottwald. The model uses a range of risk variables including census data, topography, land use, and known incidence of both HLB and ACP to produce a risk value ranging from 0 (extremely low risk) to 1 (very high risk), with intervals based on decimal values between 0 and 1, that applies to each square mile. The risk model is proven to correctly anticipate the presence of HLB, as demonstrated when it indicated high risk in Hacienda Heights and San Gabriel before HLB was discovered there. The model predicted the emergence of HLB in Riverside County in 2013 – 2014, and an HLB outbreak occurred there in 2017. The model is now indicating a spreading area of high risk in Los Angeles County, but with new foci of high risk that are distant from the original focus in Los Angeles County.

Though the risk model is helpful in showing high risk areas, it did not and could not have predicted the immense increase of HLB detections in the four months leading up to the release of the November 22, 2017 briefing paper.

The level of HLB among ACP is measured via DNA analysis with Ct values. The Ct values obtained from ACP samples inside the quarantine areas are showing an increase in the infection levels, indicating an intensification of the pathogen population in the local vector population. The appearance of ambiguous infection results outside the existing quarantine areas highlights the risk of ACP spreading the disease and the need for quarantine regulations that apply at a larger scale than the current radius around confirmed HLB-positive trees.

The rate of accumulation of new positive ACP and tree detections was thought to be relatively stable before the release of the November 22, 2017 briefing paper. But between June 2017 and the present time, the risk model demonstrates that there has been a dramatic increase in the rate of new detections of HLB infections in both ACP and citrus trees.

In addition, there has been a recent increase in the number of cities where positive finds have been reported and a sharp increase in the number of ACP nymph detections (indicating a burgeoning population).

These increases among various indicators demonstrate an exponential increase in the intensity of the HLB epidemic at multiple scales. The pathogen is becoming more prevalent in the vector population and in the tree population. At the same time, the upswing in nymphal detections indicates that the transmission rate is increasing, and the increase in the number of cities with positive detections indicates that the geographic extent of the epidemic is rapidly increasing. The November 22, 2017 briefing paper concluded that, given the very sharp increase in the intensity of the epidemic, a rapid response is needed to implement additional measures to slow the rate of spread of HLB beyond its current range before the opportunity is lost.

The risk level is generally higher in the south than north because of the known presence of HLB and large ACP populations in the southern counties. There are areas of elevated risk of HLB scattered throughout the state.

After ACP infests an area with HLB infected trees, the vector population eventually comes into contact with the infected trees and foci of disease begin to build around them. This is because ACP acquires the pathogen from the infected trees and establishes a recurring cycle of infection and acquisition. Because trees remain asymptomatic for a long period of time, the infection spreads in the absence of detection.

Following consultation with internal technical staff, the Department concurs with the conclusions of the November 22, 2017 briefing paper. Therefore, it is necessary to pursue the amendment of CCR Section 3439 as an emergency to ensure a more effective and efficient responsive approach is in place when needed and can be removed in a consistent and timely matter when unnecessary. The purpose of this proposed amendment is to accomplish this in a transparent manner that can be more easily understood by those who may be affected by this regulation in the future. This amendment specifies the process for adding and removing quarantine areas, establishing the initial size of the area, establishing how the area may be expanded if there are additional detections of HLB within the quarantine area, establishes an appeal process, and a list serve option.

## Background

The California citrus industry has taken a great deal of responsibility in preparing for the introduction and establishment of HLB-associated bacteria and psyllid vectors. Funding has been allocated towards research on easy and early (i.e., pre-clinical) detection methods (i.e., development of a laboratory protocol to detect all known strains and host chemical responses), the identification of HLB-associated bacterial strains, and vector relationships. In addition, a public relations firm has been hired to determine the most effective and efficient methods to educate the general public and make them feel as though they are part of the solution. Industry leaders (research and marketing boards) are involved in procuring federal funds for national research programs in the areas of host plant resistance, etiological agents and variants of HLB, specific native and exotic natural enemies of the insect vectors, and pesticide efficacy and new chemistries.

California citrus industry leaders recognized that Florida lacked supplies of HLB-free citrus stock when the pathogen was detected in 2005. As a result, plans have been implemented to expand the screenhouse facilities to produce certified pathogen-free nursery stock and budwood. Other alternatives are being considered to protect valuable citrus propagation sources, germplasm, and breeding material, such as isolated and/or protected locations and tissue culture. In addition, various approaches are being employed to produce HLB resistant and immune citrus varieties.

Senate Bill 140 (SB 140), chaptered November 2, 2009, requires the Department to establish a Citrus Nursery Stock Pest Cleanliness Program (CNSPCP) to protect citrus nursery source propagative trees from harmful diseases, pests, and other risks and threats. One of the diseases of primary concern was HLB. The bill requires that anyone propagating citrus by any means must comply with all of the eligibility requirements and testing protocols issued by the Secretary. Furthermore, the bill authorized the department to adopt and enforce regulations to carry out the program and to issue orders establishing rates or prices to cover the department's costs for administration, testing, inspection and other services under the program. The bill declared that it was to take effect immediately as an urgency statute.

The Department adopted Sections 3701, et. seq., as an emergency action effective May 17, 2010, to establish a mandatory Citrus Nursery Stock Pest Cleanliness Program (CNSPCP). The adoption of Section 3701 et. seq. established that participation in the CNSPCP is mandatory for any person (with the exception of the Citrus Clonal Protection Program) who, by any method of propagation, produces any citrus nursery stock. The CNSPCP describes the diseases for which testing is required and the test methods to be used, a list of laboratories approved for performing the tests, frequency of such testing, requirements and time frames for growing registered mother trees and increasing trees in protective structures, a performance standard for such structures, a fee schedule for participants, record-keeping requirements for the Department and participants, elements of a required application form and compliance agreement between nurseries and the Department, provisions for suspending or cancelling the registration status of citrus trees, and provisions for mandatory destruction of trees and/or propagative materials for which registration has been cancelled.

#### Project Description

Under this proposed emergency action, the amendment specifies the process for adding quarantine areas, establishes the initial size of the area, establishes how the area may be expanded if there are additional detections of HLB within the quarantine area, establishes an appeal process, and describes a list serve option for obtaining information regarding HLB regulation. The list serve will function as a form of active communication providing current and immediate updates on regional quarantines to those stakeholders impacted by the regulation. Any interested party may subscribe to the list serve to receive such updates.

CCR Section 3439 Subsection (b)(1) establishes that a county or portion thereof shall be included in the regional quarantine when:

- 1) Survey results indicate an HLB infestation is present. An HLB infestation is present when one or more HLB-infected host plants are officially determined. This is determined by regularly scheduled detection surveys conducted throughout the state in commercial and residential citrus. Areas where HLB has been detected in host plants meet the federal definition of an HLB infestation.

- 2) The local California County Agricultural Commissioner has been notified and requests the quarantine. This complies with FAC Section 5251, which requires the Department to immediately report the discovery of a pest to the local California County Agricultural Commissioner.

CCR Section 3439 Subsection (b)(1) establishes that any individual or local entity may receive notification about changes to the regional quarantine, including through a list serve subscription. The list serve will function as a form of active communication providing current and immediate updates regarding changes in regional quarantine zones. Any Individual or local entity may choose to subscribe to the list serve to receive such updates. This is done to ensure that the public and affected entities have several methods of receiving information.

CCR Section 3439 Subsection (b)(2) establishes that an infestation of HLB is present when a single host plant tests positive for the disease organism.

CCR Section 3439 Subsection (b)(3) Establishes that a minimum radius of 5 miles is used surrounding detection sites for official HLB-infected plant detections, that known mapping features are used when possible and that minimal-length imaginary lines may be used with or without latitude and longitude points.

CCR Section 3439 Subsection (b)(4) Establishes that a satellite infestation is an HLB detection within any established HLB quarantine area. A satellite infestation may be used as an epicenter to establish an additional 5 miles radius that surrounds the satellite detection site and modifies the border of the quarantine area.

CCR Section 3439 Subsection (b)(5) Establishes that any interested party may appeal the quarantine area designation by the Department and the process to do so. There is a need to provide an opportunity for both local and public input. This section provides that opportunity. However, prior to this proposed amendment, the Secretary would amend CCR Section 3439 as an emergency action. "Emergency" means a situation that calls for immediate action to avoid serious harm to the public peace, health, safety, or general welfare," according to Government

Code Section 11342.545. If a state agency makes a finding that the adoption of a regulation is necessary to address an emergency, the regulation may be adopted as an emergency regulation, per Government Code Section 11346.1(b)(1). It is necessary to continue to recognize the emergency nature in this proposed quarantine regulation. Therefore, it is necessary that any appeal of an area designation be held to a high standard; this is achieved through requiring appeals to contain clear and convincing evidence that the quarantine expansion does not meet the criteria specified in regulation to change the quarantine boundaries. Such evidence would be comparable to that sufficient to overturn or prevent a proposed emergency regulation being approved by the Office of Administrative Law.

The Department also relied upon the following information:

Briefing Paper: "Recent changes in the ACP/HLB invasion in California and implications for regional quarantines." Neil Mc Roberts, Carla Thomas, Brianna McGuire, Beth Grafton Cardwell, David Bartels, Tim Gottwald. November 22, 2017.

Economic Impacts of Citrus Greening (HLB) in Florida, 2006/07-2010/11, University of Florida IFAS Extension.

Federal Register, Vol. 76, No. 81, dated April 27, 2011, Docket No. APHIS-2010-0048, Citrus Canker, Citrus Greening and Asian Citrus Pysllid; Interstate Movement of Regulated Nursery Stock.

"New Pest Response Guidelines, Citrus Greening Disease," dated June 2, 2008, United States Department of Agriculture, Animal and Plant Health Inspection Service.

Pest and Damage Record # RS0P50000415 California Department of Food and Agriculture, Plant Health and Pest Prevention Services.

Authority and Reference Citations:

Authority: Sections 401, 403, 407, 5301, and 5322, Food and Agricultural Code

Reference: Sections 401, 401.5 403, 407, 5251, 5302, and 5322, Food and Agricultural Code and Section 3439 of the California Code of Regulations.

### Informative Digest

Existing law, FAC Section 403, provides that the department shall prevent the introduction and spread of injurious insect or animal pests, plant diseases, and noxious weeds.

Existing law, FAC Section 407, provides that the Secretary may adopt such regulations as are reasonably necessary to carry out the provisions of this code which the Secretary is directed or authorized to administer or enforce.

Existing law FAC 5301 states that the director may establish, maintain, and enforce such quarantine regulations as she deems necessary to protect the agricultural industry of this state from pests. The regulations may establish a quarantine at the boundaries of this state or elsewhere within the state.

Existing law, FAC Section 5321, provides that the Secretary is obligated to investigate the existence of any pest that is not generally distributed within this State and determine the probability of its spread, and the feasibility of its control or eradication.

Existing law, FAC Section 5322, provides that the Secretary may establish, maintain, and enforce quarantine, eradication, and such other regulations as are in her opinion necessary to circumscribe and exterminate or prevent the spread of any pest which is described in FAC section 5321.

Existing law, CCR Section 3439, defines the state's interior quarantine area for HLB, articles and commodities covered by the quarantine, restrictions, and exemptions.

The existing law obligates the Secretary to investigate and determine the feasibility of controlling or eradicating pests of limited distribution but establishes discretion with regard to the establishment and maintenance of regulations to achieve this goal. The amendment of CCR

3439 benefits the citrus industries (nursery, fruit for domestic use and exports, citrus packing facilities) and the environment (urban landscapes) by specifying how to establish a quarantine program to prevent the artificial spread of HLB over long distances.

This amendment provides the necessary regulatory authority to prevent the artificial spread of a serious insect pest, that is a mandated statutory goal.

FAC Section 401.5 states: "The department shall seek to protect the general welfare and economy of the state and seek to maintain the economic well-being of agriculturally dependent rural communities in this state." The amendment of CCR Section 3439 is preventing the artificial spread of HLB to uninfested areas of the State.

HLB is generally distributed in Florida due to ACP being generally distributed there. The University of Florida Institute of Food and Agricultural Services Extension calculated and compared the impact of having and not having HLB present in Florida and concluded HLB had a total impact of \$3.64 billion and eliminated 0.08 percent of the total Florida workforce. The overall California economy benefits by the amendment of this regulation, which is intended to prevent ACP and HLB from becoming generally distributed in California and negatively impacting California's economy as happened in Florida. It is critical to adopt this regulation at the current juncture because HLB has been introduced into California.

The California, national, and international consumers of California will benefit by having high quality fruit available at lower cost. Confining the HLB infestation to the smallest area possible ensures citrus and other host fruits are available for consumption and at reasonable prices.

The amendment of CCR Section 3439 benefits homeowners who grow citrus for consumption and grow host material such as ornamentals in various rural and urban landscapes because the regulation prevents death of to these hosts and the need for them to be removed to mitigate infestations of HLB.

The USDA must regulate the entire state if California does not establish a parallel interior

quarantine which is substantially the same as the federal domestic regulation. In the absence of a parallel interior quarantine, the USDA may quarantine all of California in order to immediately prevent the affected host material from moving interstate. The proposed emergency amendment of CCR Section 3439 would keep more onerous federal requirements at the minimum level necessary.

The Department is the only agency which can implement plant quarantines. As required by Government Code Section 11346.5(a)(3)(D), the Department has conducted an evaluation of this regulation and has determined that it is not inconsistent or incompatible with existing state regulations.

#### Section 3439. Huanglongbing Interior Quarantine.

The Department is proposing to amend CCR Section 3439, which currently regulates all HLB-host material under a single set of criteria to establish quarantine restrictions and boundaries. Under the proposed CCR Section 3439, the quarantine area would be established administratively based on specific pest risk criteria.

#### Mandate on Local Agencies or School Districts

The Department of Food and Agriculture has determined that Section 3439 does not impose a mandate on local agencies or school districts. No reimbursement is required under Section 17561 of the Government Code because each county agricultural commissioner in a county where ACP has been detected has requested the State to implement a state interior quarantine for ACP.

#### Cost Estimate

The Department has also determined that the regulation will involve no additional costs or savings to any state agency because initial funds for state costs are already appropriated, no nondiscretionary costs or savings to local agencies or school districts, no cost to any local agency or school district requiring reimbursement pursuant to Government Code 17500 et seq. and no costs or savings in federal funding to the State.