

Botryosphaeriaceae in China: Diversity, Distribution, and Host Associations

Asha J. Dissanayake¹  and Jian-Kui Liu^{1*} 

¹School of Life Science and Technology, University of Electronic Science and Technology of China, Chengdu 611731, China

*Corresponding author: liujiankui@uestc.edu.cn (J.-K. L.)

Received: 27 October 2025 / Accepted: 6 January 2026 / Published: 31 January 2026

Abstract

Botryosphaeriaceae (Botryosphaerales, Dothideomycetes) encompasses a diverse group of fungi with roles as endophytes, saprobes, and pathogens. Members of Botryosphaeriaceae are responsible for various plant diseases, including cankers, dieback, fruit and root rots, and leaf spots, and have garnered significant attention in the realm of fungal biology. This study provides an up-to-date assessment of the prevailing status of Botryosphaeriaceae in China by synthesizing information from published records and accessible sequence data. Recently, a considerable number of studies on Botryosphaeriaceae in China based on molecular sequence data have been conducted, uncovering a broad host range and localities (except the Xizang Autonomous Region due to insufficient studies), some of which have not been described before. To date, 22 genera encompassing 236 species in Botryosphaeriaceae have been reported worldwide (www.botryosphaerales.org), while 15 genera and 101 species (52 new species) have been reported in China. Among the identified species, *Botryosphaeria dothidea*, *Diplodia seriata*, *Lasiodiplodia pseudotheobromae*, *L. theobromae*, *Macrophomina phaseolina*, and *Neofusicoccum parvum* exhibit wide host ranges and are distributed across numerous provinces in China. Conversely, certain species exhibit a more restricted distribution and are identified only in specific localities on particular hosts. Instances of such singularities include *Botryobambusa* and *Cophinforma*, each reported only once in China. Notably, approximately 22% of all reported Botryosphaeriaceae species have been described in China. Although regular data collection is still mandatory, the evidence presented here provides a baseline for Botryosphaeriaceae species isolated in China and will strengthen future findings on this group of important pathogens.

Key words: Botryosphaerales, Distribution, Hosts, New records, Novel species, Pathogens

Citation: Dissanayake, A.J., Liu, J.-K. (2026) Botryosphaeriaceae in China: Diversity, Distribution, and Host Associations. *PhytoMycology* (2026) 2: 2001 <https://doi.org/10.65390/phytomyc.2026.2001>

Introduction

Botryosphaeriaceae is a fungal family with a variety of life modes ranging from endophytes to pathogens and saprobes (Slippers & Wingfield 2007; Liu et al. 2012; Dissanayake et al. 2016). Some species of *Botryosphaeria*, *Diplodia*, *Dothiorella*, *Lasiodiplodia*, and *Neofusicoccum* comprise endophytes (Crous et al. 2006, 2016; Slippers & Wingfield 2007; Zhang et al. 2021b), while most of the Botryosphaeriaceae species are important phytopathogens associated with various diseases causing severe ecological and economic damages (Phillips et al. 2019). They are well recognized as the principal pathogens inhabiting woody tissues and causing infections in forestry, cultivation, and urban trees (Slippers & Wingfield 2007). Members of this family occur on a broad host range of monocotyledonous and dicotyledonous hosts; on woody branches, leaves, stems and culms of grasses; and on twigs and in the thalli of lichens with a worldwide distribution (Barr 1987; von Arx 1987; Denman et al. 2000; Mohali et al. 2007; Lazzizzera et al. 2008; Marincowitz et al. 2008).

As the mycology field has been modernized by the application of DNA sequencing techniques, Botryosphaeriaceae members have also undergone a revolutionary era, and most taxonomy-related complications have been resolved. Liu et al. (2012) accepted 29 genera in Botryosphaeriaceae based on morphology and molecular data. Phillips et al. (2013) provided detailed descriptions and keys for 17 genera in Botryosphaeriaceae. Burgess et al. (2019) and Garcia et al. (2021) included 24 genera in Botryosphaeriaceae based on morpho-molecular data. However, Dissanayake et al. (2021) mentioned that this family consists of 22 genera, as it is on www.botryosphaerales.org. Botryosphaeriaceae is the largest family in Botryosphaerales (Wijayawardene et al. 2020; Zhang et al. 2021b), and nearly 230 species have been described based on DNA sequence data (Batista et al. 2021).

Recent studies on Botryosphaeriaceae in China have identified a broad range of species, some of which have not been previously described. In China, infections related to Botryosphaeriaceae have been described on numerous hosts such as economically important crops (Yu et al. 2012b; Yan et al. 2013; Dissanayake et al. 2015a, b; Xu et al. 2016; Dou et

al. 2017; Chen et al. 2020; Liang et al. 2020), forest trees (Zhu et al. 2018; Pan et al. 2019), and various other woody hosts. In this study, we gathered relevant data for every Botryosphaeriaceae record in China, verified by DNA sequence analyses. Hence, we were able to compose an archive that comprises the details of hosts and localities and focused on the following matters: (1) What are the commonly found Botryosphaeriaceae species with a wide host range? (2) How are the common Botryosphaeriaceae pathogens distributed throughout China, and to which climatic zones do they belong? (3) Which specific hosts have been extensively studied to observe the presence of Botryosphaeriaceae species?

Data Analysis

To access the appropriate data on Botryosphaeriaceae species reported in China, ‘Web of Science’ ([Web of Science](#)), which is a database of bibliographic citations of multidisciplinary areas that covers various journals in scientific fields; ‘Google Scholar’ ([Google Scholar](#)); ‘Research Gate’ ([ResearchGate](#)); and ‘CNKI’ (China National Knowledge Infrastructure—a key national information project of China with the aim of realizing knowledge sharing in the whole country) platforms were investigated. Manuscripts published in the above-mentioned databases without sequence data were ignored when compiling the archive of ‘Botryosphaeriaceae in China’. Sequence data were attained on behalf of one demonstrative isolate of the respective Botryosphaeriaceae

species existing in China, and an alignment of the concatenated internal transcribed spacer region (ITS) and the translation elongation factor 1- α (tef1- α) gene was generated including two *Aplosporella* species known from China as outgroup taxa. Phylogenetic analysis was conducted as described by Dissanayake et al. (2020).

Botryosphaeriaceae species in China

The archive contained 527 taxonomy- and phylogeny-based manuscripts related to Botryosphaeriaceae species in China. To date, molecular taxonomic descriptions have recognized 22 genera in Botryosphaeriaceae ([Botryosphaeriales.org](#)), of which 15 are reported in China (Table 1). The following seven genera have not yet been known in China: *Alanphillipsia*, *Eutiarosporella*, *Marasasiomyces*, *Mucoharknessia*, *Oblongocollomyces*, *Sakireeta* and *Tiarosporella*. Of the 236 species identified worldwide, 101 are found in China, with 52 of them originating and being introduced as novel species in China. The highest number of species found in China are from the larger common genera, namely *Botryosphaeria*, *Diplodia*, *Lasiodiplodia*, *Macrophomina* and *Neofusicoccum*. It was also noted that 16 *Lasiodiplodia* (out of all 52 type species) and 11 *Neofusicoccum* (out of all 41 type species) species were introduced as novel species from China. It was notable that most of the novel species of Botryosphaeriaceae in China have been isolated from *Eucalyptus* sp. (Table 1).

Table 1 Botryosphaeriaceae genera known from DNA sequence data. The total number of species, number of species reported in China, novel species introduced from China, hosts of novel species, and locations of novel species introduced from China are stated.

Genus	All species	Species in China	Number of new species from China	Novel species introduced from China	Hosts of novel species	Location of novel species
<i>Alanphillipsia</i>	5	--	--	--	--	--
<i>Barriopsis</i>	6	2	--	--	--	--
<i>Botryobambusa</i>	2	1	1	<i>Bo. guizhouensis</i>	Unknown	Guizhou
<i>Botryosphaeria</i>	10	8	3	<i>B. puerensis</i>	<i>Eucalyptus</i> sp.	Yunnan
				<i>B. qinlingensis</i>	<i>Quercus aliena</i>	Shaanxi
				<i>B. qingyuanensis</i>	<i>Eucalyptus</i> sp.	Guangdong
<i>Cophinforma</i>	2	1	--	--	--	--
<i>Diplodia</i>	25	8	2	<i>Di. quercicola</i>	Forest trees	Beijing
				<i>Di. salicicola</i>		
<i>Dothiorella</i>	32	9	4	<i>Do. alpina</i>	<i>Citrus unshiu</i>	Hunan
				<i>Do. citrimurcotticola</i>	<i>Citrus reticulata</i> × <i>Citrus sinensis</i>	Chongqing
				<i>Do. hortiarborum</i>		
				<i>Do. yunnana</i>	<i>Camellia</i> sp.	Yunnan
<i>Endomelanconiopsis</i>	3	2	--	--	--	--
<i>Eutiarosporella</i>	7	--	--	--	--	--
<i>Lasiodiplodia</i>	52	31	16	<i>L. chinensis</i>	Unknown	Hainan
				<i>L. cinnamomi</i>	<i>Cinnamomum camphora</i>	Jiangsu
				<i>L. clavisporea</i>	<i>Vaccinium uliginosum</i>	Fujian
				<i>L. endophytica</i>	<i>Magnolia candollei</i>	Yunnan
				<i>L. fici</i>	<i>Ficus altissima</i>	Guangdong
				<i>L. fujianensis</i>	<i>Vaccinium uliginosum</i>	Fujian
				<i>L. guilinensis</i>	<i>Citrus sinensis</i>	Guangxi
				<i>L. henanica</i>	<i>Vaccinium uliginosum</i>	Henan
				<i>L. huangyanensis</i>	<i>Citrus reticulata</i>	Zhejiang
				<i>L. hyalina</i>	<i>Acacia confusa</i>	Hainan
				<i>L. linhaiensis</i>	<i>Citrus unshiu</i>	Zhejiang
				<i>L. magnoliae</i>	<i>Magnolia candollei</i>	Yunnan

Genus	All species	Species in China	Number of new species from China	Novel species introduced from China	Hosts of novel species	Location of novel species
<i>Macrophomina</i>	4	2	1	<i>L. nanpingensis</i>	<i>Vaccinium uliginosum</i>	Fujian
				<i>L. paraphysoides</i>	<i>Vaccinium uliginosum</i>	Shandong
				<i>L. ponkanicola</i>	<i>Citrus reticulata</i>	Zhejiang
				<i>L. vaccinii</i>	<i>Vaccinium</i> sp.	Beijing
				<i>M. vaccinii</i>	<i>Vaccinium</i> sp.	Fujian
<i>Marasasiomyces</i>	1	--	--	--	--	--
<i>Mucoharknessia</i>	2	--	--	--	--	--
<i>Neodeightonia</i>	9	3	1	<i>Ne. arengae</i>	<i>Arenga tremula</i>	Guangdong
<i>Neofusicoccum</i>	41	17	11	<i>N. dianense</i>	<i>Eucalyptus urophylla</i>	Yunnan
				<i>N. hongkongensis</i>	<i>Araucaria cunninghamii</i>	Hong Kong
				<i>N. ilicii</i>	<i>Illicium verum</i>	Guangxi
				<i>N. magniconidium</i>	<i>Eucalyptus</i> sp.	Yunnan
				<i>N. microconidium</i>	<i>Eucalyptus</i> sp.	Guangdong
				<i>N. ningerense</i>	<i>Eucalyptus</i> sp.	Yunnan
				<i>N. parviconidium</i>	<i>Eucalyptus</i> sp.	Yunnan
				<i>N. sinense</i>	Unknown	Guizhou
				<i>N. sinoeucalypti</i>	<i>Eucalyptus</i> sp.	Guangdong
				<i>N. vaccinii</i>	<i>Vaccinium</i> sp.	Shandong
				<i>N. yunnanense</i>	<i>Eucalyptus</i> sp.	Yunnan
				--	--	--
<i>Neoscytalidium</i>	2	2	--	--	--	--
<i>Oblongocollomyces</i>	1	--	--	--	--	--
<i>Phaeobotryon</i>	14	9	9	<i>P. aplosporum</i>	Forest trees	Beijing
				<i>P. caraganae</i>	<i>Caragana arborescens</i>	Heilongjiang
				<i>P. fraxini</i>		
				<i>P. laricinum</i>		
				<i>P. longiparaphysium</i>		
				<i>P. rhoinum</i>	<i>Rhus typhina</i>	Beijing
				<i>P. rhois</i>	<i>Rhus typhina</i>	Ningxia
				<i>P. spiraeae</i>	<i>Spiraea salicifolia</i>	Beijing
				<i>P. xizangense</i>		
				--	--	--
<i>Sakireeta</i>	1	--	--	--	--	--
<i>Sardiniella</i>	4	3	2	<i>S. elliptica</i>	Unknown	Guizhou
				<i>S. guizhouensis</i>	Unknown	Guizhou
<i>Sphaeropsis</i>	7	4	2	<i>Sp. guizhouensis</i>	Unknown	Guizhou
				<i>Sp. linhaiensis</i>	<i>Citrus</i> sp.	Zhejiang
<i>Tiarosporella</i>	2	--	--	--	--	--

Owing to tremendous differences in latitude, longitude, and altitude, the climate of China is extremely diverse. It ranges from tropical in the far south to subarctic in the far north and alpine at higher elevations of the Xizang Autonomous Region. Five major climatic zones have been identified in China: tropical monsoon, subtropical monsoon, temperate monsoon, temperate continental and Xizang Autonomous Region climates. Numerous studies have been conducted on the effects of climate change on ecosystem structures and functions (Grimm et al. 2013). As the biodiversity structure comprehensively reflects various changes in ecological gradients (Gaston 2000), studying biodiversity and ecological processes along with climate zones can improve the predictions of climate change across ecosystems (Grimm et al. 2013). Herein, we examined the distribution of Botryosphaeriaceae species across China (Fig. 1), while six major Botryosphaeriaceae species reported from China have been presented with their respective climatic zones (Fig. 2). Most Botryosphaeriaceae pathogens in China are predominantly distributed in warmer, tropical, and subtropical monsoon climate regions, although some species can also be found in temperate zones (Fig. 1). Key points regarding their distribution

and climate preference in China are: 1) *Botryosphaeria dothidea*, a very prevalent species, has a wider distribution, occurring in both temperate and subtropical monsoon climate regions and found in almost all regions of China. 2) *Lasiodiplodia theobromae* and *L. pseudotheobromae* are specifically reported to occur in tropical, subtropical and temperate monsoon climate regions in China. 3) Aggressive species of *Neofusicoccum*, such as *N. parvum*, are mainly distributed in the southwest and south of China, which are warmer areas. However, they are reported in tropical, subtropical and temperate monsoon climate regions. 4) *Macrophomina phaseolina* is also reported in tropical, subtropical and temperate climatic regions. 5) *Diplodia seriata*, in contrast, is primarily found in temperate monsoon climate regions. However, they are also present in subtropical climate zones. Generally, these fungi are globally distributed in tropical and temperate regions, but their disease outbreaks are often associated with humid and warm environments, with increasing temperatures and drought stress (potentially linked to climate change) exacerbating the diseases they cause. This highlights that while the family is diverse, the most aggressive and prevalent species in China are strongly

associated with warmer climates. Botryosphaeriaceae species have been reported from various climatic zones, except the Xizang Autonomous Region climate, due to insufficient sampling in this region.

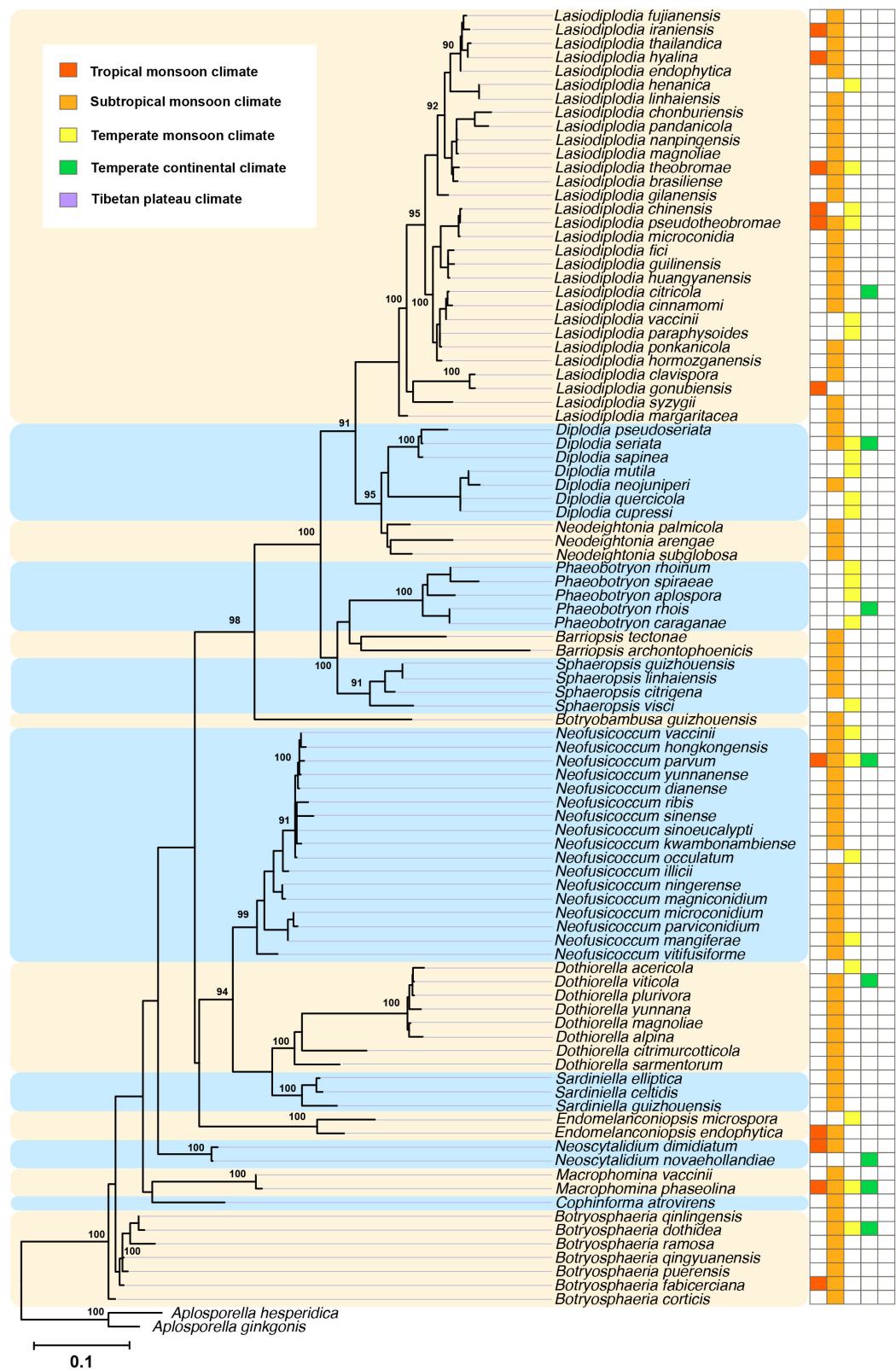


Fig. 1 Phylogram of concatenated ITS and *tef1-α* sequence data for Botryosphaeriaceae species known from China. Two *Aplosporella* species were included as outgroup taxa. The climatic zones where each species has been reported are given on the right.

Distribution of Botryosphaeriaceae genera/species in China

Botryosphaeriaceae species have been reported from almost all provinces in China (except the Xizang Autonomous Region) (Fig. 1). Approximately 68% Botryosphaeriaceae genera have been reported in China. This is a relatively high incidence compared to the Botryosphaeriaceae genera found in Australia (Burgess et al. 2019), as there were reports about only nine genera: *Botryosphaeria*, *Diplodia*, *Dothiorella*, *Eutiarospora*, *Lasiodiplodia*, *Macrophomina*, *Neofusicoccum*, *Neoscytalidium* and *Tiarospora*. Our study revealed

that about 41% of Botryosphaeriaceae species have been reported from China, whereas about 28% have been reported in Australia (Burgess et al. 2019).

Botryosphaeria dothidea, *Diplodia seriata*, *Lasiodiplodia pseudotheobromae*, *L. theobromae*, *Macrophomina phaseolina* and *Neofusicoccum parvum* are the commonly reported species in China (Appendix S1), representing 20%, 3%, 27%, 17%, 4% and 14% respectively. Several species, such as *B. dothidea*, *M. phaseolina* and *N. parvum* have distributed throughout various climatic zones, while other species (*D. seriata*, *L. pseudotheobromae* and *L. theobromae*) found across tropical and temperate regions (Figs. 1, 2).

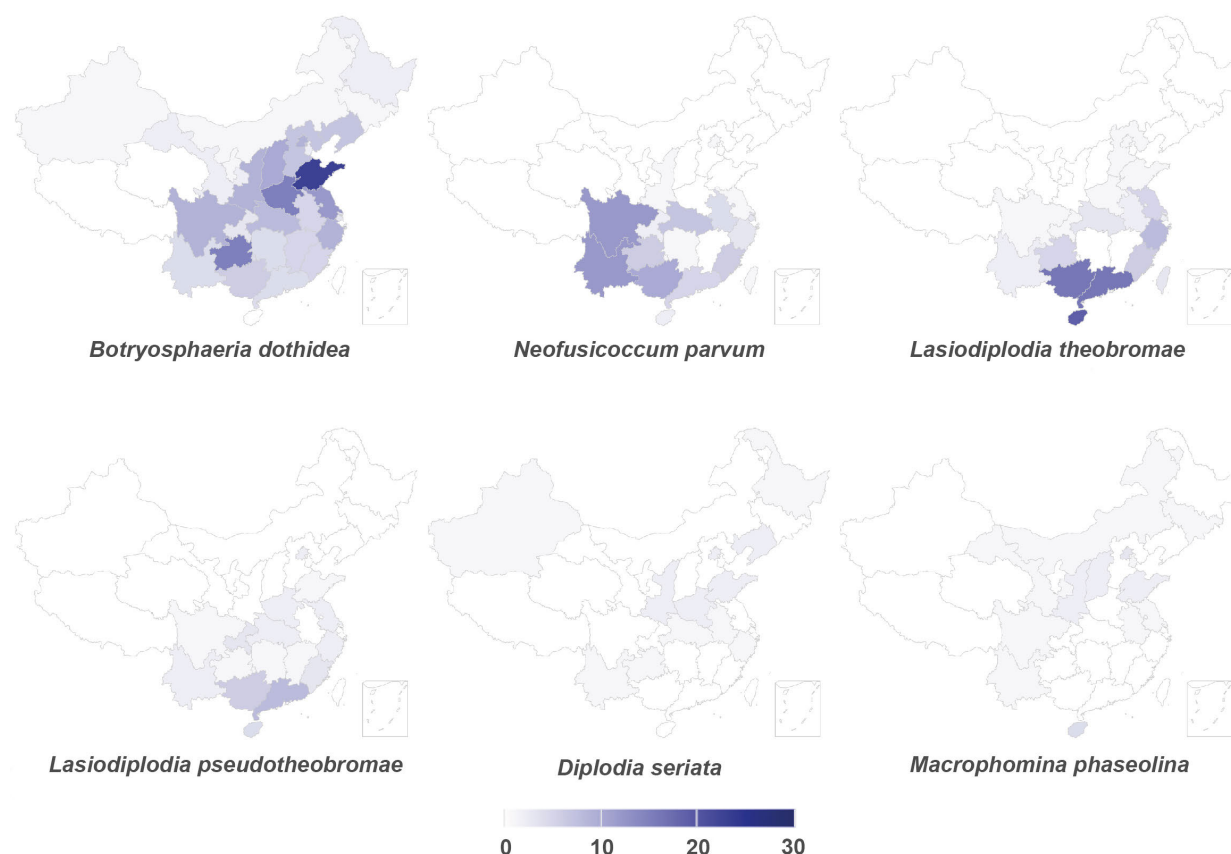


Fig. 2 The distribution patterns of major Botryosphaeriaceae species found in China: *Botryosphaeria dothidea*, *Diplodia seriata*, *Lasiodiplodia pseudotheobromae*, *L. theobromae*, *Macrophomina phaseolina* and *Neofusicoccum parvum*. The 0–30 scale represents the number of species isolated in each province.

Host association of Botryosphaeriaceae species in China

Commonly reported Botryosphaeriaceae species in China are *Botryosphaeria dothidea*, *Diplodia seriata*, *Lasiodiplodia pseudotheobromae*, *L. theobromae*, *Macrophomina phaseolina* and *Neofusicoccum parvum* (Fig. 2). These species have been isolated from various woody hosts and have been reported at highest frequencies in several hosts (Table 2).

Nevertheless, there are numerous species, which seem to appear with a narrow host range (Appendix S1).

First disease reports of pathogenic Botryosphaeriaceae species in China

To date, there have been approximately 111 first disease reports of Botryosphaeriaceae species on various hosts in China, which have been published in the plant pathology-related journals such as 'Plant Disease' and 'Journal of Plant Pathology'. These first disease reports indicate the presence of common Botryosphaeriaceae species on various hosts and their rapid spread and infection of new hosts (Table 3). There have been numerous first disease reports in the last three years compared to previous years.

Table 2 Commonly found Botryosphaeriaceae species in China and frequently studied host species.

Commonly reported species	No. of Hosts	Widely found hosts
<i>Botryosphaeria dothidea</i>	101	<i>Actinidia chinensis</i> , <i>Citrus</i> sp., <i>Eucalyptus</i> sp., <i>Juglans regia</i> , <i>Malus domestica</i> , <i>Prunus persica</i> , <i>Pyrus</i> sp., <i>Vaccinium corymbosum</i> , <i>Vitis vinifera</i> , <i>Zizyphus jujuba</i>
<i>Diplodia seriata</i>	11	<i>Pyrus</i> sp.
<i>Lasiodiplodia pseudotheobromae</i>	32	<i>Citrus</i> sp., <i>Eucalyptus</i> sp.
<i>Lasiodiplodia theobromae</i>	65	<i>Camellia oleifera</i> , <i>Citrus</i> sp., <i>Eucalyptus</i> sp., <i>Vitis vinifera</i>
<i>Macrophomina phaseolina</i>	15	<i>Glycine max</i> , <i>Helianthus annuus</i>
<i>Neofusicoccum parvum</i>	56	<i>Actinidia deliciosa</i> , <i>Eucalyptus</i> sp., <i>Prunus persica</i> , <i>Pyrus</i> sp., <i>Vaccinium corymbosum</i> , <i>Vitis vinifera</i>

Table 3 First disease reports of Botryosphaeriaceae species in China

Species	Hosts and References
<i>Botryosphaeria dothidea</i>	<i>Acer platanoides</i> (Wang et al. 2015); <i>Aesculus chinensis</i> (Wang et al. 2025); <i>Aucuba japonica</i> (Zheng et al. 2019); <i>Betula alnoides</i> (Wang et al. 2020a); <i>Camellia sinensis</i> (Jayawardena et al. 2016); <i>Canarium album</i> (Lai et al. 2024); <i>Carya cathayensis</i> (Zhang and Xu 2011); <i>Carya illinoensis</i> (Wang et al. 2021a); <i>Cathaya argyrophylla</i> (Ou et al. 2025); <i>Celtis sinensis</i> (Wang et al. 2021b); <i>Cornus alba</i> (Cai et al. 2020a); <i>Cotinus coggygria</i> (Fan et al. 2019); <i>Crataegus pinnatifida</i> (Wang et al. 2025); <i>Eucalyptus</i> sp. (Yu et al. 2009); <i>Euonymus fortunei</i> (Wang et al. 2025); <i>Euonymus japonicus</i> (Fan et al. 2021); <i>Fagopyrum tataricum</i> (Tang et al. 2022); <i>Fatsia japonica</i> (Li et al. 2018a); <i>Ficus carica</i> (Wang et al. 2020b); <i>Gleditsia sinensis</i> (Huang et al. 2021); <i>Glycine max</i> (Chen et al. 2021a); <i>Hedera helix</i> (Wang et al. 2020c); <i>Helwingia chinensis</i> (Yu et al. 2012a); <i>Idesia polycarpa</i> (Fang et al. 2024); <i>Kadsura coccinea</i> (Su et al. 2021); <i>Lycium barbarum</i> (Liu et al. 2024); <i>Mangifera indica</i> (Mo et al. 2013); <i>Morus</i> sp. (Huang et al. 2019a); <i>Nicotiana</i> sp. (Bian et al. 2015); <i>Ophiopogon japonicus</i> (Zhang et al. 2025); <i>Osmanthus fragrans</i> (Xie et al. 2010); <i>Paeonia suffruticosa</i> (Zhang et al. 2012); <i>Parrotia subaequalis</i> (Yang et al. 2024); <i>Persea americana</i> (Qiu et al. 2020a); <i>Photinia x fraseri</i> (Pan et al. 2025); <i>Prunus Armeniaca</i> (Huang et al. 2019b); <i>Prunus avium</i> (Zhang et al. 2019a); <i>Prunus serrulata</i> (Yan et al. 2016); <i>Punica granatum</i> (Liu et al. 2009); <i>Pyracantha fortuneana</i> (Chen et al. 2025); <i>Rosa chinensis</i> (Jia et al. 2019); <i>Rosa roxburghii</i> (Hu et al. 2025); <i>Salix babylonica</i> (Ju et al. 2021); <i>Syringa oblata</i> (Zhi et al. 2024); <i>Vaccinium</i> sp. (Yu et al. 2012b); <i>Vatica mangachapoi</i> (Yang et al. 2019); <i>Xanthoceras sorbifolium</i> (Liu et al. 2018); <i>Yulania denudata</i> (Rui et al. 2025); <i>Zizyphus jujuba</i> (Ran et al. 2018)
<i>Diplodia mutila</i>	<i>Zizyphus jujuba</i> (Feng et al. 2019)
<i>Diplodia sapinea</i>	<i>Pinus tabulaeformis</i> (Li et al. 2016)
<i>Diplodia seriata</i>	<i>Cedars</i> sp. (Jiao et al. 2014); <i>Juglans regia</i> (Zhang et al. 2017); <i>Prunus armeniaca</i> (Liu et al. 2015); <i>Vitis vinifera</i> (Yan et al. 2011)
<i>Lasiodiplodia brasiliense</i>	<i>Mangifera indica</i> (Zhang et al. 2018)
<i>Lasiodiplodia gilanensis</i>	<i>Machilus thunbergia</i> (Li et al. 2018b)
<i>Lasiodiplodia hormozganensis</i>	<i>Scaevola taccada</i> (Zhang et al. 2021a)
<i>Lasiodiplodia jatrohicola</i>	<i>Caryota mitis</i> (Zhu et al. 2015)
<i>Lasiodiplodia pseudotheobromae</i>	<i>Hevea brasiliensis</i> (Wu et al. 2019); <i>Macadamia</i> sp. (Chang et al. 2019); <i>Malus domestica</i> (Xue et al. 2019); <i>Morinda officinalis</i> (Dong et al. 2019); <i>Ormosia pinnata</i> (Li et al. 2020a); <i>Plukenetia volubilis</i> (Wang and Song 2021)
<i>Lasiodiplodia theobromae</i>	<i>Annona squamosa</i> (Wang et al. 2022); <i>Aquilaria sinensis</i> (Fan et al. 2013); <i>Broussonetia papyrifera</i> (Luo et al. 2020); <i>Camellia oleifera</i> (Zhu et al. 2014); <i>Camellia sinensis</i> (Li et al. 2019a); <i>Cassia fistula</i> (Deng et al. 2015); <i>Citrus maxima</i> (Luo et al. 2011); <i>Citrus sinensis</i> (Gui et al. 2020); <i>Cocos nucifera</i> (Zhang and Niu 2019); <i>Ficus carica</i> (Chen et al. 2018a); <i>Fraxinus americana</i> (Chen et al. 2019a); <i>Hibiscus mutabilis</i> (Bu et al. 2018); <i>Kadsura longipedunculata</i> (Fan et al. 2020); <i>Koeleruteria bipinnata</i> (Tan et al. 2012); <i>Mangifera indica</i> (Ma et al. 2021); <i>Morus</i> sp. (Xie et al. 2014); <i>Passiflora edulis</i> (Zhang et al. 2021b); <i>Persea americana</i> (Qiu et al. 2020b); <i>Plukenetia volubilis</i> (Wang and Song 2021); <i>Ricinus communis</i> (Tang et al. 2021); <i>Zea mays</i> (Ma et al. 2016)
<i>Macrophomina phaseolina</i>	<i>Atractylodes lancea</i> (Cai et al. 2020b); <i>Curcuma longa</i> (Sun et al. 2020); <i>Helianthus annuus</i> (Zhang et al. 2016); <i>Plukenetia volubilis</i> (Wang et al. 2020d); <i>Vicia faba</i> (Sun et al. 2019); <i>Vigna radiata</i> (Zhang et al. 2011)

Species	Hosts and References
<i>Neodeightonia palmicola</i>	<i>Caryota mitis</i> (Mukhtar et al. 2019)
<i>Neofusicoccum mangiferae</i>	<i>Kandelia obovata</i> (Lin et al. 2019); <i>Sassafras tzumu</i> (Wan et al. 2020); <i>Sonneratia apetala</i> (Qiu et al. 2018); <i>Vitis vinifera</i> (Dissanayake et al. 2015a);
<i>Neofusicoccum parvum</i>	<i>Camellia drupifera</i> (Yu et al. 2022); <i>Cupressus funebris</i> (Li et al. 2010); <i>Eriobotrya japonica</i> (Zhai and Zhang 2019); <i>Geodorum eulophioides</i> (Du et al. 2021); <i>Hevea brasiliensis</i> (Liu et al. 2017); <i>Juglans regia</i> (Chen et al. 2019b); <i>Koelreuteria paniculata</i> (Fang et al. 2019); <i>Ligustrum lucidum</i> (Huang et al. 2020); <i>Malania oleifera</i> (Pan et al. 2022); <i>Osmanthus fragrans</i> (Zhixing et al. 2022); <i>Phoebe sheareri</i> (Chen et al. 2019c); <i>Phoebe zhennan</i> (Zhu et al. 2019); <i>Platanus acerifolia</i> (Yu et al. 2018); <i>Plum</i> (Li et al. 2019b); <i>Prunus persica</i> (Gao et al. 2019); <i>Prunus persica</i> (Song et al. 2019); <i>Prunus persica</i> (Zhang et al. 2019b); <i>Rhododendron</i> sp. (Yang et al. 2015); <i>Santalum album</i> (Wang et al. 2016); <i>Scaevola taccada</i> (Li et al. 2020b); <i>Viburnum odoratissimum</i> (Ma et al. 2022); <i>Vitis heyneana</i> (Wu et al. 2015); <i>Zanthoxylum bungeanum</i> (Chen et al. 2021b)
<i>Neofusicoccum vitifusiforme</i>	<i>Vaccinium</i> sp. (Kong et al. 2010)
<i>Neoscytalidium dimidiatum</i>	<i>Agave sisalana</i> (Xie et al. 2021); <i>Dioscorea esculenta</i> (Lin et al. 2017); <i>Hylocereus undatus</i> (Lan et al. 2012)
<i>Sphaeropsis visci</i>	<i>Viscum coloratum</i> (Chen et al. 2018b)

Widely studied hosts of Botryosphaeriaceae fungi

Most host records of Botryosphaeriaceae fungi are for woody crop plants and forestry plantations, including *Acacia confusa*, *Camellia sinensis*, *Carya cathayensis*, *Citrus* sp., *Eucalyptus* sp., *Juglans regia*, *Malus domestica*, *Mangifera indica*, *Prunus persica*, *Pyrus* sp., *Vaccinium corymbosum*

and *Vitis vinifera* (Fig. 3, Appendix S1). Common species, including *Botryosphaeria dothidea*, *Diplodia seriata*, *Lasiodiplodia pseudotheobromae*, *L. theobromae*, *Macrophomina phaseolina* and *Neofusicoccum parvum* are extensively isolated as pathogens of woody crops globally. They are also widely distributed on these crops and forestry plantations in China.

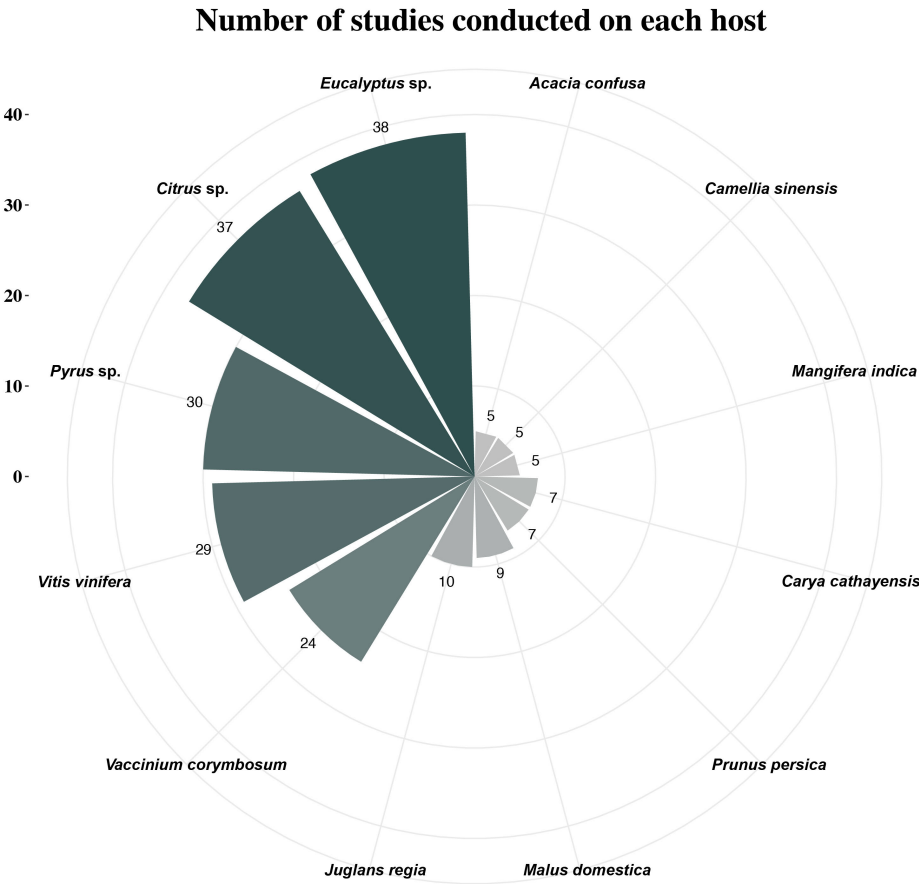


Fig. 3 Widely studied hosts of Botryosphaeriaceae fungi and the number of studies conducted on each host in China.

The number of studies on the distribution, diversity, ecology, and pathogenicity of Botryosphaeriaceae species is regularly increasing (Appendix S1). As a result, various species have been identified from numerous hosts in China. *Barriopsis* (*Ba. archontophoenicis*), *Botryosphaeria* (*B. dothidea*), *Lasiodiplodia* (*L. pseudotheobromae*, *L. theobromae*) and *Neofusicoccum* (*N. parvum*) have been isolated from *Camellia sinensis*. *Botryosphaeria* (*B. dothidea*), *Diplodia* (*D. seriata*), *Dothiorella* (*Do. alpina*, *Do. citrimurcotticola*, *Do. plurivora*), *Lasiodiplodia* (*L. citricola*, *L. guilinensis*, *L. huangyanensis*, *L. iraniensis*, *L. linhaiensis*, *L. microconidia*, *L. ponkanicola*, *L. pseudotheobromae*, *L. theobromae*), *Neodeightonia* (*N. subglobosa*), *Neofusicoccum* (*N. parvum*) and *Sphaeropsis* (*S. linhaiensis*) have been isolated from *Citrus* sp., and most importantly, a numerous number of *Lasiodiplodia* species have been reported on this host. *Botryosphaeria* (*B. dothidea*, *B. fabicerciana*, *B. puerensis*, *B. qingyuanensis*, *B. ramosa*), *Lasiodiplodia* (*L. brasiliensis*, *L. pseudotheobromae*, *L. theobromae*), and *Neofusicoccum* (*N. dianense*, *N. kwambonambiense*, *N. magniconidium*, *N. microconidium*, *N. ningerense*, *N. parviconidium*, *N. parvum*, *N. ribis*, *N. sinoeucalypti*, *N. yunnanense*) have been isolated from *Eucalyptus* sp.; however, this host seems to have a great affection for the genus *Neofusicoccum* with ten species reported. Five Botryosphaeriaceae genera — *Botryosphaeria* (*B. dothidea*), *Diplodia* (*D. seriata*), *Dothiorella* (*Do. sarmentorum*), *Lasiodiplodia* (*L. pseudotheobromae*) and *Neofusicoccum* (*N. parvum*)—have been reported from *Juglans regia*. *Botryosphaeria* (*B. dothidea*), *Lasiodiplodia* (*L. brasiliensis*, *L. theobromae*) and *Neofusicoccum* (*N. mangiferae*, *N. parvum*) have been isolated from *Mangifera indica*. *Botryosphaeria* (*B. dothidea*), *Diplodia* (*D. seriata*), *Dothiorella* (*Do. viticola*), *Lasiodiplodia* (*L. citricola*, *L. pseudotheobromae*, *L. theobromae*) and *Neofusicoccum* (*N. mangiferae*, *N. parvum*) are reported from *Vitis vinifera* (Appendix S1). The number of Botryosphaeriaceae species from a particular host continues to grow, with further studies to be conducted in China.

There are more new studies on Botryosphaeriaceae than ever before, but there are still not enough standardized databases that are consistently curated and kept up to date over time. The ineffectiveness of new occurrences and host-fungus associations in reporting widens the gap between science and society and weakens scientific vitality to enhance preventive and quarantine policy measures. Public sequence data that enable the scientific community to validate and confirm the taxonomic identification should be available after this fungal family is reported in indexed scientific journals (Batista et al. 2021). Hence, this work represents a single effort to refine and organize all taxonomy-related Botryosphaeriaceae occurrences in China, and researchers working with Botryosphaeriaceae-related research in China are encouraged to update their information in a database in the future.

Acknowledgments

This work was funded by grants of the National Natural Science Foundation of China (32570014; 32350410401). Jin-Tao Zhu is thanked for his assistance on the literature searching and data analyses.

Author contributions

Conceptualization: Dissanayake AJ and Liu JK; methodology, Dissanayake AJ; formal analysis, Dissanayake AJ; writing—original draft preparation: Dissanayake AJ; writing—review & editing: Dissanayake AJ and Liu JK; supervision: Liu JK; project administration: Liu JK; funding acquisition: Liu JK. All authors have read and agreed to the published version of the manuscript.

ORCID

Asha J. Dissanayake: <https://orcid.org/0000-0002-8061-8884>
Jian-Kui Liu: <https://orcid.org/0000-0002-9232-228X>

Conflict of interest statement

The author list includes members of the Editorial Board of PhytoMycology. They were not involved in the journal's review of, or decisions related to, this manuscript. The authors declare no competing interests.

Supplementary Information

The online version contains supplemental information available at <https://doi.org/10.65390/phytomyc.2026.2001>

References

- Barr ME (1987) Prodromus to class Loculoascomycetes. Published by the author Amherst.
- Batista E, Lopes A, Alves A (2021) What do we know about Botryosphaeriaceae? An overview of a worldwide curated dataset. *Forests* 12:313–330.
<https://doi.org/10.3390/f12030313>
- Bian CH, Miao P, Kang YB (2015) First report of canker disease of flue-cured *Tobacco Nicotiana* sp. caused by *Botryosphaeria dothidea* in China. *Plant Disease* 99:890–890.
<https://doi.org/10.1094/pdis-10-14-1085-pdn>
- Bu JY, Yu ZH, Li QL, Deng TJ, Huang SP, Tang LH, Guo TX, Mo JY, Hsiang T (2018) First report of canker disease of *Hibiscus mutabilis* caused by *Lasiodiplodia theobromae* in China. *Plant Disease* 102:1667–1667.
<https://doi.org/10.1094/pdis-11-17-1828-pdn>
- Burgess TI, Tan YP, Garnas J et al (2019) Current status of the Botryosphaeriaceae in Australia. *Australian Plant Pathology* 48:35–44.
- Cai L, Zhang Y, Wang H, Xu C, Sun X (2020b) First report of root rot caused by *Macrophomina phaseolina* on *Atractylodes lancea* in China. *Plant Disease* 104:3081–3081.
<https://doi.org/10.1094/pdis-02-20-0259-pdn>
- Cai YN, Wang KQ, Zhang X, Li YG (2020a) First report of leaf spot of *Cornus alba* caused by *Botryosphaeria dothidea* in China. *Plant Disease* 104:282–282.
<https://doi.org/10.1094/pdis-06-19-1336-pdn>
- Chang JM, Zhan RL, Liu F, Wu JB (2019) First report of *Lasiodiplodia pseudotheobromae* causing husk rot in *Macadamia*. *Plant Disease* 103:153–153.
<https://doi.org/10.1094/pdis-06-18-1048-pdn>
- Chen F, Zheng X, Zhao X, Chen F (2019a) First report of *Lasiodiplodia theobromae* causing stem canker of *Fraxinus americana*. *Plant Disease* 103:3276–3276.
<https://doi.org/10.1094/pdis-04-19-0892-pdn>
- Chen J, Li S, Han S, Qiao T, Zhou Y, Zhu T (2021b) First report of *Neofusicoccum parvum* causing stem and branch blight dis-

- ease of *Zanthoxylum bungeanum* in Sichuan, China. Plant Disease 105:3742–3742.
<https://doi.org/10.1094/pdis-10-20-2131-pdn>
- Chen J, Liu X, Jia H, Zhu W (2018b) First report of leaf-spot disease caused by *Sphaeropsis visci* on Asian mistletoe [*Viscum coloratum* (Kom) Nakai] in China. Journal of Forestry Research 29:1769–1774.
<https://doi.org/10.1007/s11676-017-0550-0>
- Chen TM, Shi XC, Wang SY, Laborda P (2021a) First report of *Botryosphaeria dothidea* causing stem canker on soybean in China. Plant Disease 105:1216–1216.
<https://doi.org/10.1094/pdis-11-20-2398-pdn>
- Chen XYL, He BY, Li HX, Cernava T, Sang WJ, Yang MF, Yang WJ (2019b) First report of black rot on walnut (*Juglans regia*) fruits caused by *Neofusicoccum parvum* in China. Plant Disease 103:3275–3275.
<https://doi.org/10.1094/pdis-02-19-0387-pdn>
- Chen Y, Bi F, Yang Y, Yang R, Guo X, Xu Y (2025) First report of *Botryosphaeria dothidea* causing fruit soft rot on *Pyracantha fortuneana* in China. Plant Disease 14(ja).
<https://doi.org/10.1094/pdis-03-25-0682-pdn>
- Chen Y, Wei H, Du G, Zhu L, Song Q, Hu Y, Wang E, Wang M, Fan X (2018a) First report of *Lasiodiplodia theobromae* causing stem canker on common Fig (*Ficus carica*) in Zhejiang Province of China. Plant Disease 102:2656–2656.
<https://doi.org/10.1094/pdis-05-18-0887-pdn>
- Chen Y, Wei H, Shen J, Jiang B, Zhu L, Song Q, Tong X, Hu Y, Cheng Y, Olson Å et al (2019c) First report of *Neofusicoccum parvum* causing stem canker and necrosis of *Phoebe sheareri* in Zhejiang Province, China. Plant Disease 103:1780–1780.
<https://doi.org/10.1094/pdis-01-19-0006-pdn>
- Chen YY, Dissanayake AJ, Liu ZY, LIU JK (2020) Additions to Karst Fungi 4: *Botryosphaeria* spp associated with woody hosts in Guizhou province China, including *B guttulata* sp nov. Phytotaxa 454:186–202.
<https://doi.org/10.11646/phytotaxa.454.3.2>
- Crous PW, Slippers B, Wingfield MJ, Rheeder J, Marasas WFO, Phillips AJL, Alves A, Burgess T, Barber P, Groenewald JZ (2006) Phylogenetic lineages in the Botryosphaeriaceae. Studies in Mycology 55:235–253.
<https://doi.org/10.3114/sim.55.1.235>
- Crous PW, Wingfield MJ, Burgess TI, Hardy GE, Crane C, Barrett S, Cano-Lira JF, Le Roux JJ, Thangavel R, Guarro J et al. (2016) Fungal Planet description sheets:469–557. Persoonia 37:218–403.
<https://doi.org/10.3767/003158516X694499>
- Deng TJ, Li QL, Chen XL, Huang SP, Guo TX, Mo JY, Wei JM, Hsiang T (2015) First report of *Lasiodiplodia theobromae* associated with stem canker of *Cassia fistula* in Guangxi, South China. Plant Disease 99:288–288.
<https://doi.org/10.1094/pdis-08-14-0872-pdn>
- Denman S, Crous PW, Taylor JE et al (2000) An overview of the taxonomic history of *Botryosphaeria* and a re-evaluation of its anamorphs based on morphology and ITS rDNA phylogeny. Studies in Mycology 45:129–140.
- Dissanayake AJ, Bhunjun CS, Maharachchikumbura SSN et al (2020) Applied aspects of methods to infer phylogenetic relationships amongst fungi. Mycosphere 11:2652–2676.
<https://doi.org/10.5943/mycosphere/11/1/18>
- Dissanayake AJ, Chen YY, Cheewangkoon R, Liu JK (2021) Occurrence and morpho-molecular identification of Botryosphaeriales species from Guizhou Province, China. Journal of Fungi 7:893.
<https://doi.org/10.3390/jof7110893>
- Dissanayake AJ, Phillips AJL, Li XH, Hyde KD (2016) Botryosphaeriaceae: Current status of genera and species. Mycosphere 7:1001–1073.
<https://doi.org/10.5943/mycosphere/si/1b/13>
- Dissanayake AJ, Zhang W, Li X, Zhou Y, Chethana T, Chuksatirote E, Hyde KD, Yan J, Zhang G, Zhao W (2015a) First report of *Neofusicoccum mangiferae* associated with grapevine dieback in China. Phytopathologia Mediterranea 54:414–419.
<http://www.jstor.org/stable/43871847>
- Dissanayake AJ, Zhang W, Mei L, Chuksatirote E, Yan J Y, Li X, Hyde K D (2015b) *Lasiodiplodia pseudotheobromae* causes pedicel and peduncle discolouration of grapes in China. Australasian Plant Disease 10:21.
<https://doi.org/10.1007/s13314-015-0170-5>
- Dong Z, Shu Y, Luo M, Zhang W, Chen X, Xiao Y, Xiang M (2019) First report of black root rot disease on *Morinda officinalis* caused by *Lasiodiplodia pseudotheobromae* in China. Plant Disease 103:2693–2693.
<https://doi.org/10.1094/pdis-04-19-0857-pdn>
- Dou ZP, He W, Zhang Y (2017) Does morphology matter in taxonomy of *Lasiodiplodia*? An answer from *Lasiodiplodia hyalina* sp. nov. Mycosphere 8:203–217.
<https://doi.org/10.5943/mycosphere/8/2/5>
- Du CJ, Yang D, Ye YF, Zhang ZB, Pan LF, Zhang J, Fu G (2021) First report of *Neofusicoccum parvum* causing leaf spot on *Geodorum eulophioides* in China. Plant Disease 105:486–486.
<https://doi.org/10.1094/pdis-03-20-0517-pdn>
- Fan MC, Yeh HC, Hong CF (2013) First report of *Lasiodiplodia theobromae* causing dieback of *Aquilaria sinensis* in Taiwan. Plant Disease 97:690–690.
<https://doi.org/10.1094/pdis-10-12-0998-pdn>
- Fan R, Tian S, Long Y, Zhao Z (2021) First report of leaf blight disease of *Euonymus japonicus* caused by *Botryosphaeria dothidea* in China. Crop Protection 141:105497.
<https://doi.org/10.1016/j.cropro.2020.105497>
- Fan R, Yin L, Wu X, Hu A, Yin X, Zhao Z, Long Y (2020) First report of *Lasiodiplodia theobromae* causing leaf blight of *Kadsura longipedunculata* in China. Plant Disease 104:3063–3063.
<https://doi.org/10.1094/pdis-02-20-0330-pdn>
- Fan SS, Huang YJ, Zhang XJ, Chen GH, Zhou J, Li X, Han MZ (2019) First report of *Botryosphaeria dothidea* causing canker on *Cotinus coggygia* in China. Plant Disease 103:2678–2678.
<https://doi.org/10.1094/pdis-04-19-0690-pdn>
- Fang L, Zheng T, Feng J, Zhi W, Wang Y, Li Z, Cai Q, Geng X, Liu Z (2024) *Botryosphaeria dothidea* causes stem canker of *Idesia polycarpa* in China. Plant Pathology 73:1372–1381.
<https://doi.org/10.1111/ppa.13895>
- Fang XM, Zeng YL, Li ZJ, Li SJ, Zhu TH (2019) First report of *Neofusicoccum parvum* associated with blotch trunk disease of *Koeleruteria paniculata* in China. Plant Disease 103:1024–1024.
<https://doi.org/10.1094/pdis-07-18-1281-pdn>
- Feng H, Hong K, Xi H, Song L, Wen C, Zang R (2019) First report of branch canker on Chinese date (*Ziziphus jujuba*) caused by *Diplodia mutila* in China. Journal of Plant Pathology 101:1251.
<https://doi.org/10.1007/s42161-019-00313-7>
- Gao L, Zhang H, Cheng Y, Li J, Liu J, Li G (2019) First report of *Neofusicoccum parvum* causing gummosis of peach (*Prunus persica*) trees in Hubei Province, Central China. Plant Disease 103:2673–2673.
<https://doi.org/10.1094/pdis-05-19-0927-pdn>
- Gaston KJ (2000) Global patterns in biodiversity. Nature 405:220–

227.
<https://doi.org/10.1038/35012228>
- Grimm NB, Chapin FS, Bierwagen B, Gonzalez P, Groffman PM, Luo Y, Melton F, Nadelhoffer K, Pairis A, Raymond PA et al (2013) The impacts of climate change on ecosystem structure and function. *Frontiers in Ecology and the Environment* 11:474–482.
<https://doi.org/10.1890/120282>
- Gui Q, Zhao J, Yu Z (2020) First report of trunk canker and gummosis of kumquat (*Citrus sinensis*) caused by *Lasiodiplodia theobromae* in China. *Plant Disease* 104:818–818.
<https://doi.org/10.1094/pdis-02-19-0424-pdn>
- Hu Q, An T, Jia W, Chen J, Xu Y, Li Z, Ding H (2025) *Botryosphaeria dothidea* causes leaf spot disease on *Rosa roxburghii* in China. *Crop Protection* 197:107312.
<https://doi.org/10.1016/j.cropro.2025.107312>
- Huang F, Yang M, Liu J, Chen Z, Fang Y, Wang Q, He S, Zhong Y, Yu L (2021) First report of *Botryosphaeria dothidea* causing stem canker and dieback of *Gleditsia sinensis* in China. *Plant Disease* 105:706–706.
<https://doi.org/10.1094/pdis-05-20-1074-pdn>
- Huang SL, Yang D, Zheng XL, Li P, Ayra-Pardo C, Wang L, Xu DY, Fu G, Du CJ (2020) First report of *Neofusicoccum parvum* causing brown spot disease on glossy privet in China. *Plant Disease* 104:2729–2729.
<https://doi.org/10.1094/pdis-02-20-0435-pdn>
- Huang Y, Meng L, Liu J, Wang C (2019a) First report of *Botryosphaeria dothidea* causing shoot canker on mulberry (*Morus* sp.) in China. *Plant Disease* 103:1788–1788.
<https://doi.org/10.1094/pdis-01-19-0183-pdn>
- Huang Y, Meng LL, Liu J, Wang CX (2019b) First report of shoot canker on Apricot (*Prunus armeniaca*) caused by *Botryosphaeria dothidea* in Shandong Province of China. *Plant Disease* 103:2945–2945.
<https://doi.org/10.1094/pdis-03-19-0522-pdn>
- Jayawardena RS, Li XH, Xu W, Yan JY, Li HL, Hyde KD (2016) First report of *Botryosphaeria dothidea* causing leaf necrosis of *Camellia sinensis* in Fujian Province China. *Plant Disease* 100:854–854.
<https://doi.org/10.1094/pdis-08-15-0930-pdn>
- Jia JY, Li XH, Zhang W, Zhou YY, Yan JY (2019) First report of *Botryosphaeria dothidea* associated with stem canker on *Rosa chinensis* in China. *Plant Disease* 103:3280–3280.
<https://doi.org/10.1094/pdis-05-19-1114-pdn>
- Jiao ZJ, Kan YC, Huang SL (2014) First report of dieback disease on Cedars caused by *Diplodia seriata* in China. *Plant Disease* 98:1279–1279.
<https://doi.org/10.1094/pdis-03-14-0309-pdn>
- Ju Y, Si YZ, Li DW, Xu W, Sun JW, Zhu LH (2021) First report of leaf blotch of *Salix babylonica* caused by *Botryosphaeria dothidea* in China. *Plant Disease* 105:224–224.
<https://doi.org/10.1094/pdis-06-20-1284-pdn>
- Kong CS, Qiu XL, Yi KS, Yu XF, Yu L (2010) First report of *Neofusicoccum vitifusiforme* causing Blueberry blight of Blueberry in China. *Plant Disease* 94:1373–1373.
<https://doi.org/10.1094/pdis-05-10-0393>
- Lai D, Wang D, Shao X, Qin J, Zhuang Q, Xiao W (2024) First report of *Botryosphaeria dothidea* causing fruit rot on Chinese Olive (*Canarium album*) in Guangdong Province of China. *Plant Disease* 108:1109.
<https://doi.org/10.1094/pdis-12-23-2707-pdn>
- Lan GB, He ZF, Xi PG, Jiang ZD (2012) First report of brown spot disease caused by *Neoscytalidium dimidiatum* on *Hylocereus undatus* in Guangdong, Chinese Mainland. *Plant Disease* 96:1702–1702.
<https://doi.org/10.1094/pdis-07-12-0632-pdn>
- Lazzizzera C, Frisullo S, Alves A, Phillips AJL (2008) Morphology phylogeny and pathogenicity of *Botryosphaeria* and *Neofusicoccum* species associated with drupe rot of olives in southern Italy. *Plant Pathology* 57:948–956.
<https://doi.org/10.1111/j.1365-3059.2008.01842.x>
- Li DX, Bao XT, Ren YF, Song BA, Chen Z, Wang Y (2019a) First report of *Lasiodiplodia theobromae* causing leaf spot on tea plant (*Camellia sinensis*) in Guizhou Province of China. *Plant Disease* 103:374–374.
<https://doi.org/10.1094/pdis-06-18-1032-pdn>
- Li HP, Wang J, Su XY, Cui JZ (2016) First report of tip blight of *Pinus tabulaeformis* caused by *Sphaeropsis sapinea* in China. *Plant Disease* 100:1497–1497.
<https://doi.org/10.1094/pdis-12-15-1393-pdn>
- Li L, Lei M, Wang H, Yang X, Andargie M, Huang S (2020a) First report of dieback caused by *Lasiodiplodia pseudotheobromae* on *Ormosia pinnata* in China. *Plant Disease* 104:2551–2555.
<https://doi.org/10.1094/pdis-03-20-0647-re>
- Li L, Shi H, Zhang S, Hu T, Wang J, Zhang C, Xu Z (2018b) First report of *Lasiodiplodia gilansensis* causing twig and leaf blight on *Machilus thunbergii* in Zhejiang Province of China. *Plant Disease* 102:2029–2029.
<https://doi.org/10.1094/pdis-11-17-1711-pdn>
- Li M, Wang Y, Gong D, Zhao C, Hu M (2020b) First report of *Neofusicoccum parvum* causing leaf spot of *Scaevola taccada* in China. *Journal of Plant Pathology* 102:1341.
<https://doi.org/10.1007/s42161-020-00628-w>
- Li Q, Tang L, Sun W, Huang S, Guo T, Mo J, Fan M, Zhang Z, Hsiang T (2019b) First report of stem canker and dieback caused by *Neofusicoccum parvum* on plum in Guangxi, Southern China. *Plant Disease* 103:2952–2952.
<https://doi.org/10.1094/pdis-03-19-0434-pdn>
- Li SB, Li JZ, Li SC, Lu ZH, Wang JH, Zhang H (2010) First report of *Neofusicoccum parvum* causing dieback disease of Chinese weeping cypress in China. *Plant Disease* 94:641–641.
<https://doi.org/10.1094/pdis-94-5-0641c>
- Li YL, Wang SB, Wang YH, Lin QK, Zhou Z (2018a) First report of *Botryosphaeria dothidea* causing a leaf wilt on *Fatsia japonica* in Henan Province, China. *Plant Disease* 102:450–450.
<https://doi.org/10.1094/pdis-08-17-1225-pdn>
- Liang L, Li H, Zhou L, Chen F (2020) *Lasiodiplodia pseudotheobromae* causes stem canker of Chinese hackberry in China. *Journal of Forestry Research* 31:2571–2580.
<https://doi.org/10.1007/s11676-019-01049-x>
- Lin CH, Chen YX, Liu WB, Wu WQ, Miao WG, Zheng FC (2017) First report of *Dioscorea esculenta* dieback caused by *Neoscytalidium dimidiatum* in China. *Plant Disease* 101:1320–1320.
<https://doi.org/10.1094/pdis-02-17-0167-pdn>
- Lin Q, He H, Xie SF (2019) First report of leaf spot caused by *Neofusicoccum mangiferae* on *Kandelia obovata* in China. *Plant Disease* 103:2479–2479.
<https://doi.org/10.1094/pdis-12-18-2216-pdn>
- Liu HX, Li XD, Zhu XP, Liu AX (2009) First report of pomegranate (*Punica granatum*) stem scab caused by *Botryosphaeria dothidea* in China. *Plant Pathology* 58:400.
<https://doi.org/10.1111/j.1365-3059.2008.01964.x>
- Liu HX, Tan WP, Sun GW, Zhao YT, He BL, Zhu XP (2015) First report of gummosis disease of Apricot (*Prunus armeniaca*) caused by *Botryosphaeria obtusa* in China. *Plant Disease*

- 99:888–888.
<https://doi.org/10.1094/pdis-09-14-0981-pdn>
- Liu J, Zhang Y, Lian L (2024) *Lycium barbarum* is a new host of *Botryosphaeria dothidea* associated with soft rot disease in China. Plant Disease 108:2571.
<https://doi.org/10.1094/pdis-01-24-0245-pdn>
- Liu JK, Phookamsak R, Doilom M, Wikey S, Li YM, Ariyawansa H, Boonmee S, Chomnunti P, Dai DQ, Bhat JD et al (2012) Towards a natural classification of Botryosphaeriales. Fungal Diversity 57:149–210.
<https://doi.org/10.1007/s13225-012-0207-4>
- Liu X, Liu HX, Han XL, Zhang YL, Liang Q, Li SK, Yang KQ (2018) First report of *Botryosphaeria dothidea* causing fruit rot of Rellowhorn (*Xanthoceras sorbifolium*) in China. Plant Disease 102:1662–1662.
<https://doi.org/10.1094/pdis-11-17-1769-pdn>
- Liu YX, Shi YP, Deng YY, Li LL, Dai LM, Cai ZY (2017) First report of *Neofusicoccum parvum* causing rubber tree leaf spot in China. Plant Disease 101:1545–1545.
<https://doi.org/10.1094/pdis-02-17-0287-pdn>
- Luo M, Dong ZY, Bin SY, Lin JT (2011) First report of fruit rot disease on Pomelo (*Citrus maxima*) caused by *Lasiodiplodia theobromae* in China. Plant Disease 95:1190–1190.
<https://doi.org/10.1094/pdis-03-11-0214>
- Luo XM, Tian TT, Tan X, Yang XY (2020) First report of *Lasiodiplodia theobromae* causing brown leaf spot on *Broussonetia papyrifera* in Southwestern China. Plant Disease 104:2024–2024.
<https://doi.org/10.1094/pdis-02-20-0254-pdn>
- Ma HX, Zhang HJ, Shi J, Dang JJ, Chang JY, Chen D, Hu QY, Guo N, Han HL (2016) First report of *Lasiodiplodia theobromae* causing maize (*Zea mays*) ear rot in Hainan Province in Southern China. Plant Disease 100:2160–2160.
<https://doi.org/10.1094/pdis-01-16-0049-pdn>
- Ma Y, Ahmad T, Zheng Y, Nie C, Liu Y (2021) First report of postharvest stem end rot of Mango Fruit (*Mangifera indica*) caused by *Lasiodiplodia theobromae* in China. Plant Disease 105:2715–2715.
<https://doi.org/10.1094/pdis-01-21-0168-pdn>
- Ma YW, Ye L, Dong SY, Huai BY, Tan GJ (2022). First report of *Neofusicoccum parvum* causing leaf spot on coral trees (*Viburnum odoratissimum*) in China. Plant Disease, 106(11), 3000.
<https://doi.org/10.1094/pdis-12-21-2799-pdn>
- Marincowitz S, Groenewald JZ, Wingfield MJ, Crous PW (2008) Species of Botryosphaeriaceae occurring on Proteaceae. Persoonia 21:111–118.
<https://doi.org/10.3767/003158508x372387>
- Mo JY, Li QL, Guo TX et al (2013) First report of gummosis caused by *Botryosphaeria dothidea* on mango trees in Guangxi South China. Journal of Plant Pathology 95:665.
<https://doi.org/10.1071/ap08085>
- Mohali SR, Slippers B, Wingfield MJ (2007) Identification of Botryosphaeriaceae from *Eucalyptus* *Acacia* and *Pinus* in Venezuela. Fungal Diversity 25:103–125.
<https://doi.org/10.1071/ap08085>
- Mukhtar I, Quan X, Khokhar I (2019) First report of leaf spot on *Caryota mitis* (Fish tail Palm) caused by *Neodeightonia palmicola* in China. Plant Disease 103:2675–2675.
<https://doi.org/10.1094/pdis-12-18-2174-pdn>
- Ou M, Yu C, Wang X et al (2025) First report of leaf blight in *Cathaya argyrophylla* caused by *Botryosphaeria dothidea* in China. Plant Disease X:X.
- Pan H, Yue J, Guo Z, Zhang J, Cao W, Li X, Li Y, Wang C (2025) First report of *Botryosphaeria dothidea* causing leaf blight on *Photinia × fraseri* in China. Plant Disease X:X.
<https://doi.org/10.1094/PDIS-04-25-0896-PDN>
- Pan M, Zhu H, Bezerra JDP, Bonthond G, Tian C, Fan X (2019) Botryosphaeralean fungi causing canker and dieback of tree hosts from mount Yudu in China. Mycological Progress 18:1341–1361.
<https://doi.org/10.1007/s11557-019-01532-z>
- Pan Y, Lei X, Wang P et al (2022) First report of leaf spot and stem canker on *Malania oleifera* caused by *Neofusicoccum parvum* in China. Journal of Plant Pathology 104:413.
<https://doi.org/10.1007/s42161-021-00978-z>
- Phillips AJ, Hyde KD, Alves A, Liu JK (2019) Families in Botryosphaeriales: a phylogenetic morphological and evolutionary perspective. Fungal Diversity 94:1–22.
<https://doi.org/10.1007/s13225-018-0416-6>
- Phillips AJL, Alves A, Abdollahzadeh J, Slippers B, Wingfield MJ, Groenewald JZ, Crous PW (2013) The Botryosphaeriaceae: Genera and species known from culture. Studies in Mycology 76:51–167.
<https://doi.org/10.3114/sim0021>
- Qiu AL, Yuan Y, Lin Q, He H, Liu LL (2018) First report of leaf spot caused by *Neofusicoccum mangiferae* on *Sonneratia apetala* in China. Plant Disease 102:2640–2640.
<https://doi.org/10.1094/pdis-03-18-0459-pdn>
- Qiu F, Tan X H, Xie CP, Xu G, Li X, Zheng FQ, Wang WL (2020b) First report of *Lasiodiplodia theobromae* causing branch blight on Avocado (*Persea americana*) in China. Plant Disease 104:2728–2728.
<https://doi.org/10.1094/pdis-03-20-0451-pdn>
- Qiu F, Xu G, Zhou J, Zheng FQ, Zheng L, Miao W G, Wang WL, Xie CP (2020a) First report of *Botryosphaeria dothidea* causing stem-end rot in Avocado (*Persea americana*) in China. Plant Disease 104:286–286.
<https://doi.org/10.1094/pdis-07-19-1439-pdn>
- Ran LX, Zhang M, Shen HM (2018) First report of red rot of *Jujube Ziziphus* (jujuba) fruit caused by *Botryosphaeria dothidea* in China. Plant Disease 102:1458–1458.
<https://doi.org/10.1094/pdis-07-17-1062-pdn>
- Rui L, Zhang QQ, Kong WL, Ni H, Wu XQ (2025) First report of *Botryosphaeria dothidea* causing leaf blight on *Yulania denudata* in China. Crop Protection X:X.
<https://doi.org/10.1016/j.cropro.2025.107180>
- Slippers B, Wingfield MJ (2007) Botryosphaeriaceae as endophytes and latent pathogens of woody plants: diversity ecology and impact. Fungal Biology Review 21:90–106.
<https://doi.org/10.1016/j.fbr.2007.06.002>
- Song ZX, Liao J, Luo H, Zhang F, Sun ZX, Liu QK, Deng J X (2019) First report of *Neofusicoccum parvum* associated with shoot blight on peaches (*Prunus persica*) in China. Plant Disease 103:1429–1429.
<https://doi.org/10.1094/pdis-12-18-2148-pdn>
- Su D, Zhang W, Sun R, Zhang Z, Lyu G (2021) First report of *Botryosphaeria dothidea* causing leaf spot on *Kadsura coccinea* in China. Plant Disease 105:2714–2714.
<https://doi.org/10.1094/pdis-01-21-0150-pdn>
- Sun SL, Zhu ZD, Duan CX, Zhao P, Sun F, Deng D, He YH (2019) First report of charcoal rot caused by *Macrophomina phaseolina* on *Faba Vicia* (faba Bean) in China. Plant Disease 103:1415–1415.
<https://doi.org/10.1094/pdis-09-18-1660-pdn>
- Sun XD, Cai XL, Pang QQ, Zhou M, Zhang W, Chen YS, Bian Q (2020) First report of *Macrophomina phaseolina* causing root rot of *Curcuma longa* in China. Plant Disease 104:3261–3261.

- <https://doi.org/10.1094/pdis-12-19-2734-pdn>
 Tan ZW, Wang CS, Wang GL (2012) First report of bark cracking of *Koeleruteria bipinnata* var *integrifoliola* caused by *Lasiodiplodia theobromae* in China. Plant Disease 96:1579–1579.
- <https://doi.org/10.1094/pdis-04-12-0337-pdn>
 Tang JR, Liu YL, Yin XG, Lu JN, Zhou YH (2021) First report of *Lasiodiplodia theobromae* causing Branch dieback on castor bean in Zhanjiang, China. Plant Disease 105:2713–2713.
- <https://doi.org/10.1094/pdis-08-20-1723-pdn>
 Tang Y, Yan J, Peng Y, Weng W, Yao X, Gao A, Cheng J, Ruan J, Zhang K (2022) First report of *Botryosphaeria dothidea* causing gray mold on tartary buckwheat in Southwest China. Plant disease 106:765–765.
- <https://doi.org/10.1094/pdis-07-21-1403-pdn>
 von Arx JA (1987) Plant pathogenic fungi. J Cramer (87):288.
- Wan Y, Wang XY, He LX, Xu W, Zhu LH (2020) First report of *Neofusicoccum mangiferae* causing shoot blight of *Sassafras tzumu* in China. Plant Disease 104:2028–2028.
- <https://doi.org/10.1094/pdis-11-19-2521-pdn>
 Wang C, Liu L, Liu Y et al (2025) First report of *Botryosphaeria dothidea* causing leaf blight on *Aesculus chinensis* in China. Journal of Phytopathology 173:e70085.
- Wang C, Wang M, Xu L, Yang Y (2022) First report of *Lasiodiplodia theobromae* causing dieback in custard apple (*Annona squamosa*) tree in China. Plant Disease 106:327–327.
- <https://doi.org/10.1094/pdis-05-21-1034-pdn>
 Wang D, Zhang YB, Chang J, Meng K, Shu JP, Zhai FY (2021a) First report of fruit black spot of Pecan (*Carya illinoensis*) caused by *Botryosphaeria dothidea* in China. Plant Disease 105:2731–2731.
- <https://doi.org/10.1094/pdis-11-20-2421-pdn>
 Wang H, Wang S, Lan Y (2021b) First report of *Botryosphaeria dothidea* causing leaf spot and wilt on *Celtis sinensis* in China. Plant Disease 105:217–217.
- <https://doi.org/10.1094/pdis-06-20-1172-pdn>
 Wang HZ, Zhu JK, Lan YB (2020c) First report of *Botryosphaeria dothidea* causing leaf wilt on *Hedera helix* in China. Plant Disease 104:1856–1856.
- <https://doi.org/10.1094/pdis-12-19-2576-pdn>
 Wang S, Lu J, Kang L, Xu D, Zhang S, Sun S, Wang J (2016) First report of *Neofusicoccum parvum* as causal agent of wilting and stem rot of *Santalum album* in Guangdong, China. Plant Disease 100:651–651.
- <https://doi.org/10.1094/pdis-05-15-0547-pdn>
 Wang S, Lu J, Meng S, Song J, Liang J (2020a) First report of *Botryosphaeria dothidea* causing canker of *Betula alnoides* in China. Plant Disease 104:3081–3081.
- <https://doi.org/10.1094/pdis-03-20-0582-pdn>
 Wang W, Song X (2021) First report of *Lasiodiplodia theobromae* and *L. pseudotheobromae* causing canker disease of *Sacha Inchi* (*Plukenetia volubilis*) in Hainan, China. Plant Disease 105:3757–3757.
- <https://doi.org/10.1094/pdis-11-20-2507-pdn>
 Wang X, Li YX, Dong HX, Jia XZ, Zhang XY (2015) First report of *Botryosphaeria dothidea* causing canker of *Acer platanoides* in China. Plant Disease 99:1857–1857.
- <https://doi.org/10.1094/pdis-03-15-0265-pdn>
 Wang X, Zhang X, Li M, Ji X, Feng C, Wang F (2020b) First report of *Ficus carica* rot caused by *Botryosphaeria dothidea* in China. Plant Disease 104:1869–1869.
- <https://doi.org/10.1094/pdis-09-19-2039-pdn>
 Wang Z, Tian H, Zhang CX et al (2020d) Occurrence of *Macrophomina phaseolina* causing root and crown rot on Alfalfa (*Medicago sativa*) in China. Plant Disease 104:2521–2521.
- <https://doi.org/10.1111/jph.70085>
 Wijayawardene NN, Hyde KD, Al-Ani LKT, Tedersoo L, Haelewaters D, Rajeshkumar KC, Zhao RL, Aptroot A, Leontyev DV, Saxena RK et al (2020) Outline of fungi and fungus-like taxa. Mycosphere 11:1060–1456.
- <https://doi.org/10.5943/mycosphere/11/1/8>
 Wu DD, Fu G, Ye YF, Hu FY, Mou HF, Qin LL, Jiang N (2015) First report of *Neofusicoccum parvum* causing panicle blight and leaf spot on *Vitis heyneana* in China. Plant Disease 99:417–417.
- <https://doi.org/10.1094/pdis-05-14-0515-pdn>
 Wu RH, Zhang Y, Li ZP (2019) First report of leaf spot on rubber tree (*Hevea brasiliensis*) caused by *Lasiodiplodia pseudotheobromae* in China. Plant Disease 103:766–766.
- <https://doi.org/10.1094/pdis-08-18-1431-pdn>
 Xie HH, Long LY, Huang SP, Mao LY, Huang QW, Wang LP, Li JX (2021) First report of black spot caused by *Neoscytalidium dimidiatum* on Sisal in Guangxi, China. Plant Disease 105:701–701.
- <https://doi.org/10.1094/pdis-08-20-1669-pdn>
 Xie HH, Wei JG, Liu F, Pan XH, Yang XB (2014) First report of Mulberry (*Morus* sp.) root rot caused by *Lasiodiplodia theobromae* in China. Plant Disease 98:1581–1581.
- <https://doi.org/10.1094/pdis-03-14-0261-pdn>
 Xie L, Huang S, Cen Z, LU WH, QIN BX, TANG CG, HU CJ, QIN LP (2010) First report of *Botryosphaeria dothidea* causing sweet Osmanthus (*Osmanthus fragrans*) leaf dieback in China. Agricultural Sciences in China 9:847–853.
- [https://doi.org/10.1016/s1671-2927\(09\)60163-2](https://doi.org/10.1016/s1671-2927(09)60163-2)
 Xu, CN, Zhang HJ, Chi FM, Ji ZR, Dong QL, Cao KQ, Zhou ZS (2016) Species-specific PCR-based assays for identification and detection of Botryosphaeriaceae species causing stem blight on blueberry in China. Journal of Integrative Agriculture 15:573–579.
- [https://doi.org/10.1016/s2095-3119\(15\)61177-7](https://doi.org/10.1016/s2095-3119(15)61177-7)
 Xue D, Meng L, Li G, Li B, Wang C (2019) First report of *Lasiodiplodia pseudotheobromae* causing canker and shoot dieback on Apple (*Malus domestica*) in China. Plant Disease 103:2478–2478.
- <https://doi.org/10.1094/pdis-01-19-0182-pdn>
 Yan JY, Li XH, Kong FF, Wang ZY, Gong LZ, He HP (2011) Occurrence of grapevine trunk disease caused by *Botryosphaeria rhodina* in China. Plant Disease 95:219–219.
- <https://doi.org/10.1094/pdis-02-10-0140>
 Yan JY, Xie Y, Zhang W, Wang Y, Liu JK, Hyde KD, Seem RC, Zhang GZ, Wang ZY, Yao SW et al (2013) Species of Botryosphaeriaceae involved in grapevine dieback in China. Fungal Diversity 61:221–236.
- <https://doi.org/10.1007/s13225-013-0251-8>
 Yan YC, Zhang ZX, Song YJ, Deng DF, Liu ZY (2016) First report of *Prunus serrulata* stem canker caused by *Botryosphaeria dothidea* in China. Plant Disease 100:858–858.
- <https://doi.org/10.1094/pdis-09-15-0981-pdn>
 Yang XM, Wang JH, Zhang YP, Wang LH, Xie WJ, Cai YF, Qu SP (2015) First report of *Neofusicoccum parvum* causing stem canker and dieback in *Rhododendron* in China. Plant Disease 99:1179–1179.
- <https://doi.org/10.1094/pdis-12-14-1346-pdn>
 Yang Y, Yin M, Shi X, Cheng Y, Zhu L, Xue L, Ruan X, Zhao K (2024) First report of *Botryosphaeria dothidea* causing leaf blight on *Parrotia subaequalis* in China. Plant Disease

- 108:3418.
<https://doi.org/10.1094/pdis-06-24-1334-pdn>
- Yang Y, Di ZG, Zhang Y, Xue R, Hu YJ (2019) Molecular and biochemical characterization of carbendazim-resistant *Botryodiplodia theobromae* field isolates. *Plant Disease* 103:2076–2082.
<https://doi.org/10.1094/pdis-01-19-0148-re>
- Yu F, Liu X, Jia X, Fu D, Song W, Niu X (2022) First report of *Neofusicoccum parvum* causing leaf spot of *Camellia drupifera* in China. *Journal of Plant Pathology* 104:431.
<https://doi.org/10.1007/s42161-021-00992-1>
- Yu L, Chen XL, Gao LL, Chen HR, Huang Q (2009) First report of *Botryosphaeria dothidea* causing canker and shoot blight of *Eucalyptus* in China. *Plant Disease* 93:764–764.
<https://doi.org/10.1094/pdis-93-7-0764c>
- Yu L, Liu JN, Chen ZB, Xu SG, Ren Z, Wang DK, Geng KY, Zhang Q, Pei WH, Kong CS (2018) First report of stem dieback on *Platanus x acerifolia* caused by *Neofusicoccum parvum* in China. *Plant Disease* 102:1446–1446.
<https://doi.org/10.1094/pdis-06-15-0642-pdn>
- Yu L, Rarisara I, Xu SG (2012b) First report of stem blight of blueberry (*Vaccinium cyanococcus*) caused by *Botryosphaeria dothidea* in China. *Plant Disease* 96:2712–2712.
<https://doi.org/10.1094/pdis-05-12-0500-pdn>
- Yu L, Wang LF, Zhao JR, Xu SG, Gao D, Zheng JF (2012a) First report of *Botryosphaeria dothidea* causing canker and dieback disease of *Helwingia chinensis* in China. *Plant Disease* 96:1821–1821.
<https://doi.org/10.1094/pdis-03-12-0275-pdn>
- Zhai L, Zhang M (2019) First report of *Neofusicoccum parvum* causing fruit rot on *Eriobotrya japonica* in China. *Plant Disease* 103:2125–2125.
<https://doi.org/10.1094/pdis-09-18-1511-pdn>
- Zhang CQ, Xu BC (2011) First report of canker on Pecan (*Carya cathayensis*) caused by *Botryosphaeria dothidea* in China. *Plant Disease* 95:1319–1319.
<https://doi.org/10.1094/pdis-05-11-0457>
- Zhang H, Wei YX, Qi YX, Pu JJ, Liu XM (2018) First report of *Lasiodiplodia brasiliense* associated with stem-end rot of mango (*Mangifera indica*) in China. *Plant Disease* 102:679–679.
<https://doi.org/10.1094/pdis-07-17-0989-pdn>
- Zhang JQ, Zhu ZD, Duan CX, Wang XM, Li HJ (2011) First report of charcoal rot caused by *Macrophomina phaseolina* on Mungbean (*Vigna radiata*) in China. *Plant Disease* 95:872–872.
<https://doi.org/10.1094/pdis-01-11-0010>
- Zhang L, Li X, Su M, Zhou J, Ye Z (2019b) First report of *Neofusicoccum parvum* associated with shoot cankers of peach (*Prunus persica*) in Shanghai, China. *Journal of Plant Pathology* 101:1257–1257.
<https://doi.org/10.1007/s42161-019-00317-3>
- Zhang LZ, Zhang Q, Yang P, Niu Y, Niu W (2019a) First report of gummosis disease of sweet cherry (*Prunus avium*) caused by *Botryosphaeria dothidea* in China. *Plant Disease* 103:3283–3283.
<https://doi.org/10.1094/pdis-07-19-1418-pdn>
- Zhang M, Wu HY, Geng YH, Yu SQ (2012) First report of *Fusicoccum aesculi* causing leaf spots of *Paeonia suffruticosa* in Henan Province, China. *Plant Disease* 96:1691–1691.
<https://doi.org/10.1094/pdis-01-12-0052-pdn>
- Zhang M, Zhang YK, Geng YH, Zang R, Wu HY (2017) First report of *Diplodia seriata* causing twig dieback of English walnut (*Juglans regia*) in China. *Plant Disease* 101:1036–1036.
<https://doi.org/10.1094/pdis-04-16-0458-pdn>
- Zhang S, Hu M, Zhao C, Wang Y, Li M, Gao Z, Li C, Yu J (2021a) First report of *Scaevola taccada* leaf spot caused by *Lasiodiplodia hormozganensis* in China. *Journal of plant pathology* 103:345.
<https://doi.org/10.1007/s42161-020-00671-7>
- Zhang W, Niu XL (2019) First report of *Lasiodiplodia theobromae* causing postharvest stem End rot on Coconut (*Cocos nucifera*) in China. *Plant Disease* 103:1420–1420.
<https://doi.org/10.1094/pdis-10-18-1861-pdn>
- Zhang W, Niu XL, Yang JY (2021b) First report of postharvest fruit rot on passion fruit (*Passiflora edulis*) caused by *Lasiodiplodia theobromae* in mainland China. *Plant Disease* 105:1198–1198.
<https://doi.org/10.1094/pdis-06-20-1346-pdn>
- Zhang Y, Zhang Q, Huo Y, Wang S (2025) First report of leaf spot disease caused by *Botryosphaeria dothidea* on *Ophiopogon japonicus* in China. *Physiological and Molecular Plant Pathology* 136:02601.
<https://doi.org/10.1016/j.pmpp.2025.102601>
- Zhang YY, Yu Y, Wang K, Li M, Xu DS, Zhao J (2016) First report of sunflower (*Helianthus annuus*) charcoal rot caused by *Macrophomina phaseolina* in Jilin and Inner Mongolia China. *Plant Disease* 100:1494–1494.
<https://doi.org/10.1094/pdis-10-15-1152-pdn>
- Zheng X, Yin P, Cheng M, Li DW, Dai T (2019) First report of stem canker caused by *Botryosphaeria dothidea* on *Aucuba japonica* in China. *Plant Disease* 103:1020–1020.
<https://doi.org/10.1094/pdis-06-18-1081-pdn>
- Zhi X, Rong X, Liang H, Shan H, Chen Z (2025) First report of leaf blight of *Syringa oblata* caused by *Botryosphaeria dothidea* in China. *Plant Disease* 108:3417.
<https://doi.org/10.1094/PDIS-06-24-1198-PDN>
- Zhixing W, Yahong Z, Yu F, Qiyu W, Jiani L, Min Y, Yu Z, Lei Y, Feiyan H (2022) First report of *Neofusicoccum parvum* causing stem blight and dieback of *Osmanthus fragrans* in China. *Journal of Plant Pathology* 104:383–384.
<https://doi.org/10.1007/s42161-021-00936-9>
- Zhu H, Niu XQ, Song WW, Yu FY, Tang QH, Qin WQ, Chen LQ (2014) First report of leaf spot of Tea Oil Camellia (*Camellia oleifera*) caused by *Lasiodiplodia theobromae* in China. *Plant Disease* 98:1427–1427.
<https://doi.org/10.1094/pdis-11-13-1166-pdn>
- Zhu H, Qin WQ, Liu L, Yan W (2015) First report of leaf spot of clustering fishtail palm (*Caryota mitis*) caused by *Lasiodiplodia jatrophiicola* in China. *Plant Disease* 99:1038–1038.
<https://doi.org/10.1094/pdis-10-14-1065-pdn>
- Zhu HY, Tian CM, Fan XL (2018) Studies of botryosphaerialean fungi associated with canker and dieback of tree hosts in Dongling mountain of China. *Phytotaxa* 348:063–076.
<https://doi.org/10.11646/phytotaxa.348.2.1>



Copyright: The Author(s) 2026. Published by BioAcademic Press on behalf of School of Life Science and Technology, University of Electronic Science and Technology of China and Faculty of Agriculture, Chiang Mai University. This is an open access article under the [Creative Commons Attribution](http://creativecommons.org/licenses/by/4.0) license (<http://creativecommons.org/licenses/by/4.0>), which permits use, distribution and reproduction in any medium, provided the original work is properly cited.