

建構韌性防災校園與防災科技資源應用計畫

Program on Building Disaster Resilient Schools and Technology Application

主管單位：教育部

王价巨¹

單信瑜²

馬士元³

馬國宸³

Wang, Jieh-Jiuh¹

Shan, Hsin-Yu²

Maa, Shyh-Yuan³

Ma, Kuo-Chen³

楊怡瑩⁴

盧彥佑⁴

陳以恩⁴

Yang, Yi-Yin⁴

Lu, Yen-Yu⁴

Chen, Yi-En⁴

¹銘傳大學建築學系

²國立交通大學土木工程學系

³銘傳大學都市規劃與防災學系

⁴社團法人臺灣防災教育訓練學會

摘要

面對氣候緊急狀態，災害愈加頻繁與嚴重，必須用更寬廣、全面性和跨領域的視野，在事前做好防範，減輕災害所造成的危害。推動學校耐災教育，建立耐災能力，成為國際災害管理之趨勢。教育部自民國 92 年起全面性規劃推動防災科技教育，在過去豐碩的基礎上，以「建構韌性，防災校園」為防災教育願景，結合防災科技資源與創新研發，推動「以判斷原則的教育，取代標準答案的訓練」，期落實「讓防災成為一種生活態度」。為強化計畫整體執行成效，109 年持續建置 628 所防災校園（累計已達 2,987 所防災校園），促成 60 件學校與產、官、學等跨單位之合作案；辦理防災教育輔導團總召會議暨縱橫向聯繫會議，促進跨單位交流與防災資源共享；研擬與試行幼兒園火災應變課程和機制，建置 28 所特殊教育學校防災校園，深化幼兒園與特殊教育學校之防災教育；修訂校園災害防救計畫、校園防災地圖與家庭防災卡等文件，加強其實用性與操作性，精進有效運作；研擬火災與地震相關情境與對策，規劃辦理 125 場輔導團、幼教與特教領域增能課程，提升學校人員防災意識與知能；研析學校法定權責與義務，推動災害防救責任分擔概念；串聯 18 所學校規劃 5 大環境及防災遊學課程路線，設計 4 份校園防災文宣，蒐集 46 份優良成果教案，彙整 157 件績優、優選學校防災教育推動成果，發行 6 期《2020 防災教育花路米》與《2019 防災教育花路米電子報》成果冊，推廣防災相關觀念與優化防災教育資源；評估 22 縣市防災教育輔導團、50 所防災校園運作情形與 61 場增能課程辦理成果，提出精進改善對策與建議，落實韌性防災校園之推動。

關鍵詞：防災教育、韌性防災校園、防災科技、能力建構

Abstract

In the face of climate emergency, disasters are becoming more frequent and serious. We must use a broader, comprehensive and interdisciplinary vision to take precautions beforehand to reduce the harm caused by disasters. Promoting disaster risk reduction education (DRRE) and building disaster resilience in schools have become the upward trend of international disaster management. MOE has promoted DRRE since 2003. Based on the richness achievement from the past, the program takes "building stronger disaster-resilient schools" as the vision. By combining resources like disaster prevention technologies and innovative researches and developments, MOE hopes to provide training on "more comprehension on judgment rules instead of rote learning" and "make Disaster Preparedness a part of our life." In order to enhance the overall effectiveness of the program, 628 Disaster Resilient Schools were established in 2020 (the total number has reached 2,987 Disaster Resilient Schools); 60 cross-unit collaboration projects among schools, industries, governmental agencies and academic institutions have been promoted. The Coordinators' meeting of the Local DRRE Counselling Group and the consultation meeting have been held to promote interdepartmental exchange and sharing disaster prevention resource. To deepen the DRRE in kindergartens and special education schools, MOE developed and tried out kindergartens' fire response courses and mechanisms as well as constructing the operation system of disaster management in 28 special education schools. Moreover, Schools Disaster Management Plan, Schools Evacuation Map and Emergency Contact Information Card template have been revised to strengthen their practicality and operability. To enhance the disaster awareness and knowledge of school personnel, scenarios and countermeasures against fires and earthquakes have been developed; 125 disaster training courses for Local DRRE Counselling Group members and teachers of preschool and special education schools have been planned and held. To build a mechanism for disaster management responsibility sharing, obligation of schools has been analyzed. To promote DRRE, there are 5 DRRE study tours connecting 18 schools planned, 4 DRRE campus posters designed, 46 excellent DRRE teaching plans collected, and 157 DRRE promotion results by quality Disaster Resilient Schools gathered. Furthermore, 6 issues of electronic publications and the publishing of *the 2019 Disaster Risk Reduction Education Newsletters* have been released. Last, the operating situation results of 22 Local DRRE Counselling Groups, 50 Disaster Resilient Schools and 61 disaster training courses have been assessed to put forward improvement suggestions, and to build stronger disaster resilient schools.

Keywords : disaster risk reduction education (DRRE), disaster resilient school, disaster technology, capacity building.