

1.	Record Nr.	UNISALENTO991000383839707536
	Autore	Rondolino, Gianni
	Titolo	Cinema e musica : breve storia della musica cinematografica / Gianni Rondolino
	Pubbl/distr/stampa	Torino : UTET, 1991
	ISBN	8877500190
	Descrizione fisica	138 p. ; 21 cm
	Collana	Collana di cinema
	Disciplina	781.542
	Soggetti	Cinematografo e musica
	Lingua di pubblicazione	Italiano
	Formato	Materiale a stampa
	Livello bibliografico	Monografia
2.	Record Nr.	UNINA9910816050503321
	Autore	Ahmadisharaf Ebrahim
	Titolo	Total Maximum Daily Load Development and Implementation : Models, Methods, and Resources
	Pubbl/distr/stampa	, : American Society of Civil Engineers, , 2021 ©2022
	ISBN	1-5231-4469-6 0-7844-8382-5
	Edizione	[1st ed.]
	Descrizione fisica	1 online resource (461 pages)
	Collana	Manuals and Reports on Engineering Practice ; ; v.150
	Altri autori (Persone)	Camacho-RinconRene A ChaoXiaobo FangXing FrostWilliam H HantushMohamed M ImenSanaz IyerSeshadri S KumarSaurav La PlanteRosanna J
	Disciplina	628.168
	Soggetti	Water--Pollution

Lingua di pubblicazione	Inglese
Formato	Materiale a stampa
Livello bibliografico	Monografia
Nota di bibliografia	Includes bibliographical references and index.
Nota di contenuto	<p>Intro -- Book_5114_C000 -- Half Title -- Title Page -- Copyright Page -- Contents -- Foreword -- Preface -- TMDL Analysis and Modeling Task Committee -- Blue-Ribbon Panel Reviewers -- Contributing Authors -- Acknowledgments -- Executive Summary --</p> <p>Book_5114_C001 -- CHAPTER 1 : Introduction -- 1.1 Definitions and History of the Total Maximum Daily Load Approach -- 1.1.1 Total Maximum Daily Load Definition and Approach -- 1.1.2 History of the Total Maximum Daily Load Approach to Water Quality-Based Management -- 1.2 Process of Determining Total Maximum Loads -- 1.2.1 Procedure for Total Maximum Daily Load Determination, Allocation, and Implementation Planning -- 1.2.1.1 Identification -- 1.2.1.2 Determination -- 1.2.1.3 Allocation -- 1.2.1.4 Implementation planning and compliance -- 1.2.2 Synoptic and Monitoring Data Requirements -- 1.3 Modeling Required to Determine a Total Maximum Daily Load -- 1.4 Benefits of the Total Maximum Daily Load Approach -- 1.5 Purpose of This Manual of Practice -- 1.6 Intended Audience for This Manual -- 1.7 Organization of This Manual -- References -- Book_5114_C002 --</p> <p>Chapter 2 : Watershed Models -- 2.1 Introduction -- 2.2 Brief Descriptions of the Selected Watershed Models -- 2.2.1 Agricultural Nonpoint-Source and Annualized Agricultural Nonpoint-Source Models -- 2.2.2 ANSWERS-2000 -- 2.2.3 Dynamic Watershed Simulation Model -- 2.2.4 Gridded Surface and Subsurface Hydrologic Analysis -- 2.2.5 Generalized Watershed Loading Function -- 2.2.6 Hydrologic Engineering Center-Hydrologic Modeling System -- 2.2.7 Hydrological Simulation Program-Fortran -- 2.2.8 Kinematic Runoff and Erosion -- 2.2.9 Loading Simulation Program in C++ -- 2.2.10 MIKE Système Hydrologique Européen -- 2.2.11 Soil and Water Assessment Tool -- 2.2.12 Storm Water Management Model. 2.2.13 Watershed Assessment Model -- 2.2.14 Watershed Analysis Risk Management Framework -- 2.3 Analyses of Models: Suitability for Total Maximum Daily Loads -- 2.3.1 Key Characteristics and Capabilities of the Models -- 2.3.2 Hydrologic Simulations in the Models -- 2.3.3 Water Quality Simulations in the Models -- 2.3.4 Strengths and Limitations of the Models and Suitability for Total Maximum Daily Loads -- 2.4 Summary, Conclusions, and Recommendations -- 2.5 State-of-the-Art and State-of-the-Practice -- References -- Book_5114_C003 --</p> <p>CHAPTER 3 : Receiving Water Quality Models -- 3.1 Introduction -- 3.2 Receiving Water Quality Models for Total Maximum Daily Load Applications -- 3.2.1 Corps of Engineers Integrated Compartment Water Quality Model -- 3.2.1.1 Model Background and Capabilities. Corps of Engineers Integrated Compartment Water Quality Model (CE-QUAL-ICM), or simply referred to as ICM, is a multidimensional water quality model developed by US Army Corps of Engineers (USACE 2014)-En -- 3.2.1.2 Applicability to Total Maximum Daily Load Studies. The ICM can simulate water quality responses to point and nonpoint-source loads and can be used as part of TMDL modeling. The model has been applied in the environmental restoration project -- 3.2.2 Water Quality Analysis Simulation Program -- 3.2.2.1 Model Background and Capabilities. The Water Quality Analysis Simulation Program (WASP) was initially</p>

developed as a transport code with water quality subroutines. After Di Toro (1983) applied the WASP model to simulate nutrient cycling in -- 3.2.2.2 Applicability to Total Maximum Daily Load Studies. The WASP model is widely used in conjunction with other transport hydrodynamic models to simulate complex water quality processes in rivers, lakes, reservoirs, estuaries, and coastal waters.

3.2.3 Environmental Fluid Dynamics Code -- 3.2.3.1 Model Background and Capabilities. The Environmental Fluid Dynamics Code (EFDC) is a surface water model with hydrodynamic and water quality modeling capabilities. The EFDC model was originally developed at the Virginia Institute of Marine S -- 3.2.3.2 Applicability to Total Maximum Daily Load Studies. The EFDC model has been widely used in more than 100 modeling studies of aquatic ecosystems around the world and in multiple TMDL studies. TMDL applications include the Peconic Bay in New Y -- 3.2.4 CE-QUAL-W2 -- 3.2.4.1 Model

Background and Capabilities. The CE-QUAL-W2 model is a two-dimensional (2D), laterally averaged hydrodynamic and water quality model. The hydrodynamic model capabilities include the simulation of water levels and depths, flow velocitie -- 3.2.4.2 Applicability to Total Maximum Daily Load Studies. The CE-QUAL-W2 model has been

widely used as a management tool to evaluate effects from various stressors, including temperature, nutrients, and organic loads in waterbodies (Bowen and Hie -- 3.2.5 Hydrologic Engineering Center-

River Analysis System -- 3.2.5.1 Model Background and Capabilities. HEC-RAS is a 1D and 2D hydraulic and water quality model for riverine ecosystems developed by the USACE Hydrologic Engineering Center (HEC). HEC-RAS is an extensively used model worldwide designed to perform -- 3.2.5.2 Applicability to Total Maximum Daily Load Studies. The HEC-RAS water quality model has been used to support TMDLs and environmental impact statement studies. Recent studies include the lower Minnesota River (Zhang and Johnson 2014), Misso -- 3.2.6

Center for Computational Hydrosience and Engineering-1D/2D/3D. 3.2.6.1 Model Background and Capabilities. The numerical models CCHE-1D/2D/3D have been developed by the National Center for Computational Hydrosience and Engineering at the University of Mississippi. This development was supported by the USDA Agri -- 3.2.6.2 Applicability to Total Maximum Daily Load Studies. CCHE-

1D/2D/3D models are applicable to TMDL studies for nutrients, sediment, toxic chemicals in channel networks, rivers, lakes, and coastal waters. The CCHE-1D model has been applied to si -- 3.2.7

Environmental Protection Division-RIV1 -- 3.2.7.1 Model Background and Capabilities. The EPD-RIV1 model is a 1D, cross-sectional-averaged, hydrodynamic, and water quality model for rivers and streams. The EPD-RIV1 model was originally developed for the Georgia Environmental Protection Divis -- 3.2.7.2 Applicability to Total Maximum Daily Load Studies. The EPD-RIV1 model can be used in 1D river systems subject to dynamic hydrodynamics. EPD-RIV1 provides time-varying simulations of water temperature and water quality with a primary focus o -- 3.2.8 QUAL2K -- 3.2.8.1 Model

Background and Capabilities. The QUAL2K model is a 1D water quality model for river and stream networks. The model is based on the algorithms and routines originally included in the QUAL2E model with improvements in the representation -- 3.2.8.2 Applicability to Total Maximum Daily Load Studies. QUAL2K has been used to support WLAs and TMDL studies of rivers and streams. Typical applications are related to pollution caused by pathogens, excess nutrients such as nitrogen and phospho -- 3.2.9 MINTEQA2 and Visual MINTEQ.

3.2.9.1 Model Background and Capabilities. The MINTEQA2 model (

Allison et al. 1991) is a geochemical equilibrium-speciation model for the fate and transport of metals in aqueous systems. MINTEQA2 and Visual MINTEQ simulate the equilibrium and mass -- 3.2.9.2 Applicability to Total Maximum Daily Load Studies. Simulation of the fate and transport and speciation of dissolved metals, free metal ions, sorbed metals, metal precipitates, and metal complexes is a difficult task. Speciation is driven by -- 3.2.10 One-Dimensional Transport with Equilibrium Chemistry -- 3.2.10.1 Model Background and Capabilities. The One-Dimensional Transport with Equilibrium Chemistry (OTEQ) model is a reactive transport model that simulates the fate and transport of solutes and speciation and transport of metals in rivers and str -- 3.2.10.2 Applicability to Total Maximum Daily Load Studies. OTEQ can be applied to support TMDLs and WLA studies related to the fate and transport of metals in rivers and streams. The model has been previously used to support the evaluation of reme -- 3.2.11 MIKE 11 -- 3.2.11.1 Model Background and Capabilities. MIKE 11 is a River Hydraulics and Sediment Transport model developed by the Danish Hydraulic Institute (DHI) Water and Environment which is currently in the MIKE+ platform (DHI 2021). The MIKE 11 model h -- 3.2.11.2 Applicability to Total Maximum Daily Load Studies. MIKE 11 is typically linked to ECO-Lab for water quality studies involving eutrophication of waterbodies, nutrient transport and cycling, and to support TMDL projects (e.g., Liang et al. -- 3.3 State-of-the-Art and State-of-the-Practice -- References -- Book_5114_C004 -- Chapter 4 : Integrated Modeling Systems and Linked Models -- 4.1 Introduction -- 4.2 Integrated Modeling Systems -- 4.2.1 BASINS Modeling System. 4.2.1.1 BASINS Model Releases. The BASINS version 1 was released in 1996 and consisted of various data sets (e.g., land use, water quality, digital elevation, river reach network, streamflow, and meteorological data), models such as HSPF, QUAL2E, an.

Sommario/riassunto

MOP 150 provides detailed descriptions of several watershed and receiving water quality models used in total maximum daily load (TMDL) analysis and modeling, highlighting recent advancements in TMDL development and implementation.
