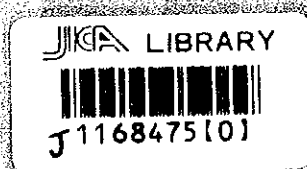


Final Report

VOL.1 PRESENT SITUATION

The Study on the Cebu Integrated Port Development Plan in the Republic of the Philippines

March 2002

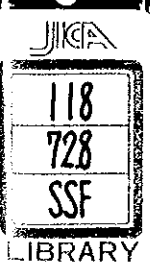


The Overseas Coastal Area Development Institute of Japan (OCDI)
Pacific Consultants International (PCI)

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Exchange Rate
1 US Dollar = 52.5 Pesos = 125 Yen
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Japan International Cooperation Agency (JICA)
Cebu Port Authority (CPA)

Final Report

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**The Study on the
Cebu Integrated
Port Development Plan
in the Republic
of the Philippines**

March 2002

The Overseas Coastal Area Development Institute of Japan (OCDI)
Pacific Consultants International (PCI)



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PREFACE

In response to a request from the Government of the Republic of the Philippines, the Government of Japan decided to conduct a study on the Cebu Integrated Port Development Plan in the Republic of the Philippines and entrusted the study to the Japan International Cooperation Agency (JICA).

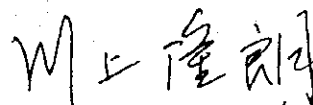
JICA selected and dispatched a study team, headed by Mr. Yukio Nishida of the Overseas Coastal Area Development Institute of Japan (OCDI) and consisting of OCDI and the Pacific Consultants International (PCI) to the Philippines, three times between December 2000 and January 2002.

The team held discussions with the officials concerned of the Government of the Republic of the Philippines and conducted field surveys at the study area. Upon returning to Japan, the team conducted further studies and prepared this final report.

I hope that this report will contribute to the promotion of the project and to the enhancement of friendly relations between our two countries.

Finally, I wish to express my sincere appreciation to the officials concerned of the Government of the Republic of the Philippines for their close cooperation extended to the team.

March, 2002



Takao Kawakami

President

Japan International Cooperation Agency

LETTER OF TRANSMITTAL

March 2002

Mr. Takao KAWAKAMI
President
Japan International Cooperation Agency

Dear Mr. Kawakami,

It is my great pleasure to submit herewith the Final Report for the Study on the Cebu Integrated Port Development Plan in the Republic of the Philippines.

The Study Team which consists of the Overseas Coastal Area Development Institute of Japan (OCDI) and the Pacific Consultants International (PCI), and headed by myself, conducted surveys in the Republic of the Philippines over the period between December 2000 and January 2002 as per the contract with the Japan International Cooperation Agency.

The findings of this study, which are compiled in this report, were fully discussed with the officials of the Cebu Port Authority (CPA) and other authorities concerned to formulate master plans for the development of Cebu Baseport/the New Cebu Port and two selected major outports with a target year of 2020, to formulate a short-term development plan and to implement a feasibility study for Cebu Baseport/the New Cebu Port with a target year of 2010.

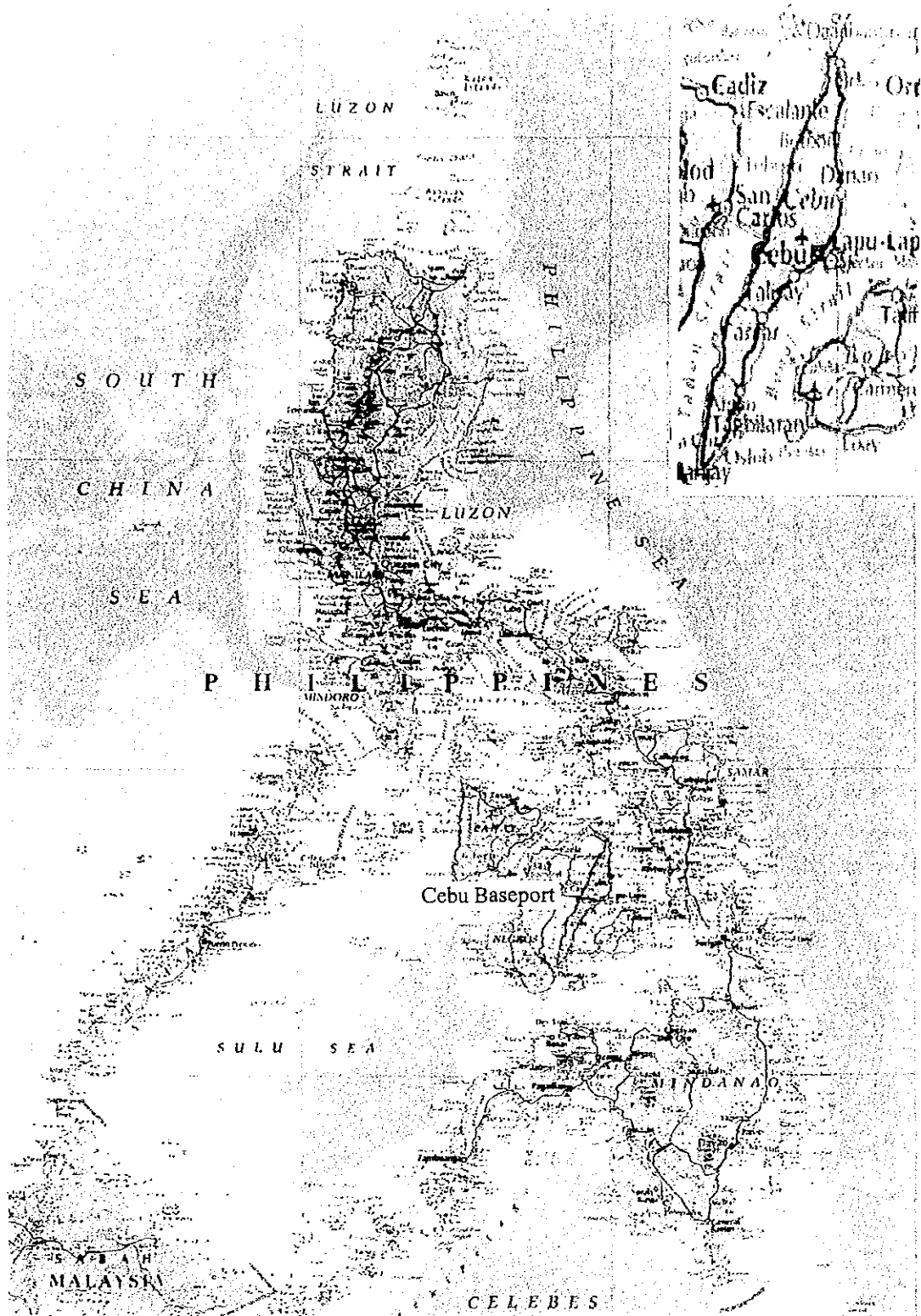
On behalf of the Study Team, I would like to express my deepest appreciation to the Government of the Republic of the Philippines, Cebu Port Authority and other authorities concerned for their brilliant cooperation and assistance in the course of the study.

I am also greatly indebted to the Japan International Cooperation Agency, the Ministry of Foreign Affairs, the Ministry of Land, Infrastructure and Transport, and the Embassy of Japan in Manila for giving us valuable suggestions and assistance during the preparation of this report.

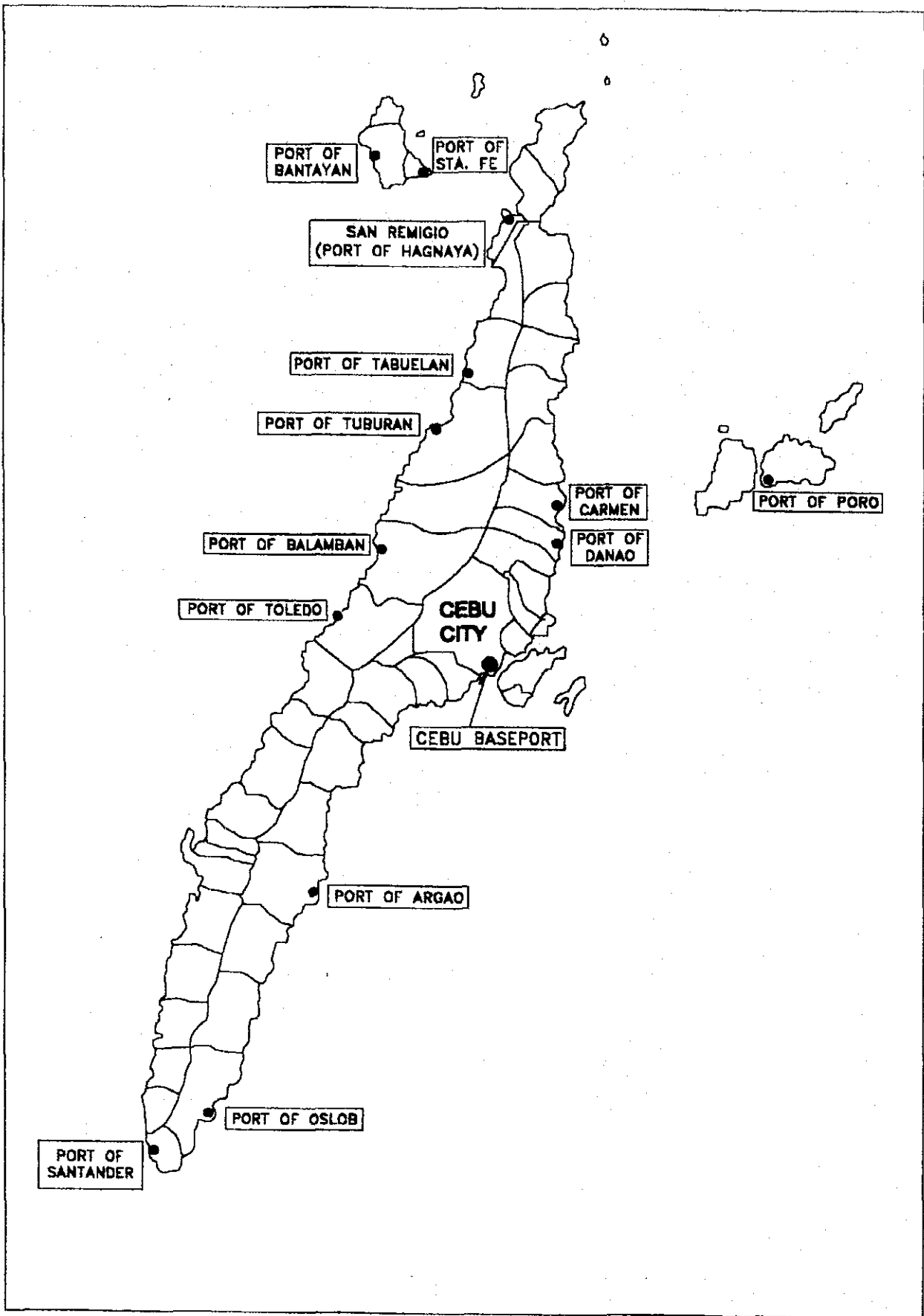
Yours faithfully,



Yukio Nishida
Leader of the Study Team
for the Study on the Cebu Integrated Port
Development Plan in the Republic of the Philippines



Location of Cebu



LIST OF ABBREVIATIONS

A	AADT	: Average Annual Daily Traffic
	AAGR	: Average Annual Growth Rate
	A&D	: Alienable and Disposable
	ADB	: Asian Development Bank
	AFC	: Atlas Fertilizer Corporation
	AIP	: Air-mans Information Publication
	ARMM	: Autonomous Region of Muslim Mindanao
	ASEAN	: Association of South East Asian Nations
	ATI	: Asian Terminal Incorporated
B	B	: Berth
	B/C	: Cost Benefit Ratio
	BFAR	: Bureau of Fisheries and Aquatic Resources
	BOD	: Biochemical Oxygen Demand
	BOO	: Build, Operate and Own
	BOR	: Berth Occupancy Ratio
	BOT	: Build, Operate and Transfer
	BOC	: Bureau of Customs
C	CAR	: Cordillera Administrative Region
	CARP	: Comprehensive Agrarian Reform Program
	CASSCOR	: Cebu Arrastre & Stevedoring Service Corporation
	CBD	: Commercial Business District
	CCWP	: Cebu City Waterfront Development Project
	CDC	: Construction Development Corporation of the Philippines
	CDO	: Cagayan de Oro
	CDS	: City Development Strategy
	CENRO	: Community Environmental and Natural Resources Office
	CFS	: Container Freight Station
	CIADMPS	: Cebu Integrated Area Development Master Plan
	CIP	: Cebu International Port
	CIPDI	: Cebu Industrial Park Developers, Inc.
	CLIP	: Cebu Light Industrial Park
	CLUP	: Comprehensive Land Use Plan
	COD	: Chemical Oxygen Demand
	CPA	: Cebu Port Authority
	CRC	: Cargo Release Control
	CVMTDP	: Cebu Visayas Medium-Term Development
	CVWSP	: Central Visayas Water and Sanitation Project

D	D	: Depth
	DA	: Department of Agriculture
	DAO	: DENR Administrative Order
	DENR	: Department of Environment and National Resources
	DO	: Dissolved Oxygen
	DOTC	: Department of Transportation and Communication
	DTI	: Department of Trade and Industry
	DPWH	: Department of Public Works and Highways
	DR	: Delivery Record
	DW	: Department Weight
	DWT	: Deadweight Tonnage
E	EDI	: Electrical Data Interchange
	ECC	: Environmental Compliance Certificate
	ECP	: Environmental Critical Projects
	EGR	: Employment Annual Growth Rate
	EIA	: Environmental Impact Assessment
	EIP	: Environmental Impact Statement System
	EIRR	: Economic Internal Rate of Return
	EIS	: Environmental Impact Study
	EMaP	: Environmental Management Plan
	EMoP	: Environmental Monitoring Plan
	EMB	: Environmental Management Bureau
	EPZ	: Export Processing Zone
	ETA	: Estimated Time of Arrival
	ETD	: Estimated Time of Departure
F	FIRR	: Financial Internal Rate of Return
	FOB	: Free On Board
	FSDC	: Farm System Development Corporation
G	GDP	: Gross Domestic Product
	GLC	: Ground Level Concentration
	GNP	: Gross National Product
	GOP	: Government of the Philippines
	GPS	: Global Positioning System
	GRDP	: Gross Regional Domestic Product
	GRT	: Gross Tonnage
H	hpa	: hectopascal

	HTCI	: Herminio Teves Company
	HWL	: High Water Level
I	IBRD	: International Bank for Reconstruction and Development
	IEE	: Initial Environmental Examination
	IFM	: Inward Foreign Manifest
	ICAO	: International Civil Aviation Organization
	IMO	: International Maritime Organization
	IPHO	: Integrated Provincial Health
J	JBIC	: Japan Bank for International Cooperation
	JICA	: Japan International Cooperation Agency
K	KVA	: Kilo Volt Ampere
L	LCT	: Loading Craft Transport
	LCL	: Less Than Container Load
	LDP	: Local Development Plan
	LGU	: Local Government Unit
	LLC	: Level Lifting Cranes
	LLW	: Lowest Low Water Level
	LOA	: Length of Overall
	LTO	: Land Transportation Office
	LUWA	: Local Unit Water Authority
	LW	: Low Water
	LWL	: Low Water Level
M	MCCU	: Monitoring Cargo Control Unit
	MCDP	: Mactan Cebu Development Project
	MCDPO	: Mactan Cebu Development Project Office
	MCIA	: Mactan Cebu International Airport
	MCIAA	: Mactan Cebu International Airport Authority
	MCWWD	: Metro Cebu Water Works Department
	MECASSI	: Metro Cebu Arrastre & Stevedoring Service
	MEZ	: Mactan Economic Zone
	MICT	: Mindanao International Container Terminal
	MICT	: Manila International Container Terminal
	MLLW	: Mean Lower Low Water
	MRT	: Mass Rail Transit
	MSL	: Mean Sea-Water Level
	MT	: Metric Ton

	MTPDP	: Medium-Term Philippine Development Plan
	MTS	: Mass Transit System
N	NAMRIA	: National Mapping Resource Information Authority
	NCR	: National Capital Region
	NCTO	: New Cebu Township One
	NEDA	: National Economic and Development Authority
	NEPC	: National Environmental Protection Council
	NIA	: National Irrigation Administration
	NOPEMCO	: The Negros Oriental Provincial Employees Multi-Purpose Cooperative
	Nox	: Nitrogen Oxides
	NPC	: National Power Corporation
	NSCB	: National Statistical Coordination Board
	NSO	: National Statistics Office
	NVOCC	: Non Vessel Operate Common Carrier
O	ODA	: Official Development Assistance
	OECD	: Organization for Economic Cooperation and Development
	OECF	: Overseas Economic Cooperation Fund (Currently JBIC)
	O-D	: Origin and Destination
	OFM	: Outward Foreign Manifest
	OPASCOR	: Oriental Port & Allied Service Corporation
P	PACD	: Presidential Arm on Community Development
	PAGASA	: Philippine Atmospheric, Geophysical and Astronomical Services Administration
	PC	: Prestressed Concrete
	P/C	: Passenger Cargo
	PCI	: Pacific Consultants International
	PCO	: Pollution Control Officer
	PCU	: Passenger Car Unit
	PD	: Presidential Decrees
	PENRO	: Provincial Environment and Natural Resources Offices
	PEZA	: Philippine Economic Zone Authority
	PHILVOLCS	: Philippine Institute of Volcanology and Seismology
	Php	: Philippine pesos
	PIC	: Provincial urban/Industrial Center
	PIE	: People's Industrial Estate
	PIE-MO	: PHIVIDEC Industrial Estate-Misamis Oriental
	PMO	: Port Management Office
	POPCEN	: POPulation CENsus
	PPA	: Philippine Ports Authority

Q	QGC	: Quay Gantry Crane
R	R.C.	: Reinforced Concrete
	RDC	: Regional Development Council
	RDP	: Regional Development Plan
	RIC	: Regional Industrial Center
	RORO	: Roll on Roll off
	RPFPP	: Regional Physical Framework Plan
	RTGs	: Rubber Tier Mounted Gantry Crane
S	SCF	: Standard Conversion Factor
	SEI(s)	: Significant Environmental Impact(s)
	SEZ	: Special Economic Zone
	SPM	: Suspended Particulate Matter
	SPSP	: Steel Pipe Sheet Pile
	SPT	: Standard Penetration Test
	SS	: Suspended Solid
	SWIP	: Small Water Impounding Project
T	TEU	: Twenty-foot Equipment Unit
	THI	: Tsuneishi Heavy Industry
	TPC	: Toledo Power Company
	TSMC	: Tolong Sugar Mill Company
U	URSUMCO	: Universal Robina Sugar Milling Corporation
	USDI	: United South Dock-Handlers Inc,
V	VAT	: Value Added Tax
	VECO	: Visayas Electric Cooperation
	VTMS	: Vessel Traffic Management System
W	WCIP	: West Cebu Industrial Park

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1. Introduction

1.1 Background of the Study

Cebu Province is expected to play an important role as a core of the economic development of Visayas and Mindanao region. To ensure that economic development and social stability will be achieved in Cebu Province and the surrounding areas, it is necessary to formulate a long-term regional development policy and port development plan in Cebu Province from the viewpoints of cargo transport, passenger transport, and industrial development.

The existing Cebu Baseport, which should play an important role for regional development, lacks a future development area and the facilities necessary to cope with the increasing volume of cargoes and passengers. Therefore, improving the existing facilities and developing a New Cebu Port are urgently required.

CPA was established in 1996 and it is the solo development and management authority of ports in Cebu Province. Considering, however, rather short experience of CPA in comprehensive port planning, close cooperation in technology transfer would be necessary.

In this regards, the Government of the Republic of the Philippines requested the Government of Japan to elaborate the Cebu Integrated Port Development Plan to ensure the promotion of port development in Cebu Province. In response, the Japan International Cooperation Agency organized a study team and carried out the study to formulate the Cebu Integrated Port Development Plan.

1.2 Objectives of the Study

The objectives of the Study are as follows.

- (1) To formulate a port development policy in Cebu Province
- (2) To formulate master plans for the development of Cebu Baseport/New Cebu Port and selected two major ports with a target year of 2020
- (3) To formulate a short-term development plan and to implement a feasibility study for the existing Cebu Baseport/New Cebu Port with a target year of 2010
- (4) To transfer technology on port development through the Study

1.3 Methodology of the Study

1.3.1 Study Area

The location of Cebu Province and major ports in Cebu Province are shown in Fig. 1.3.1-1 and Fig. 1.3.1-2.

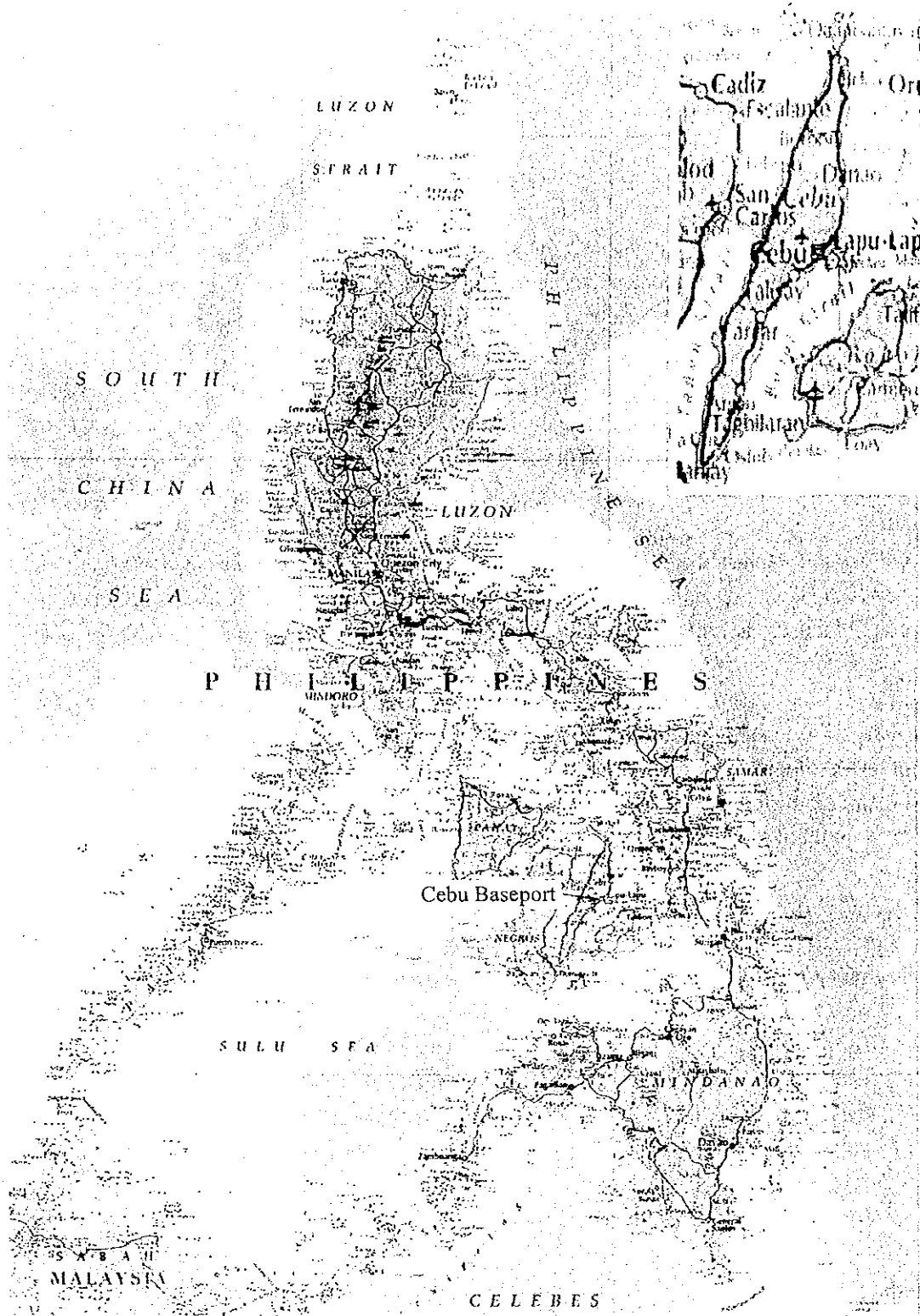


Fig. 1.3.1-1 Location of Cebu Province

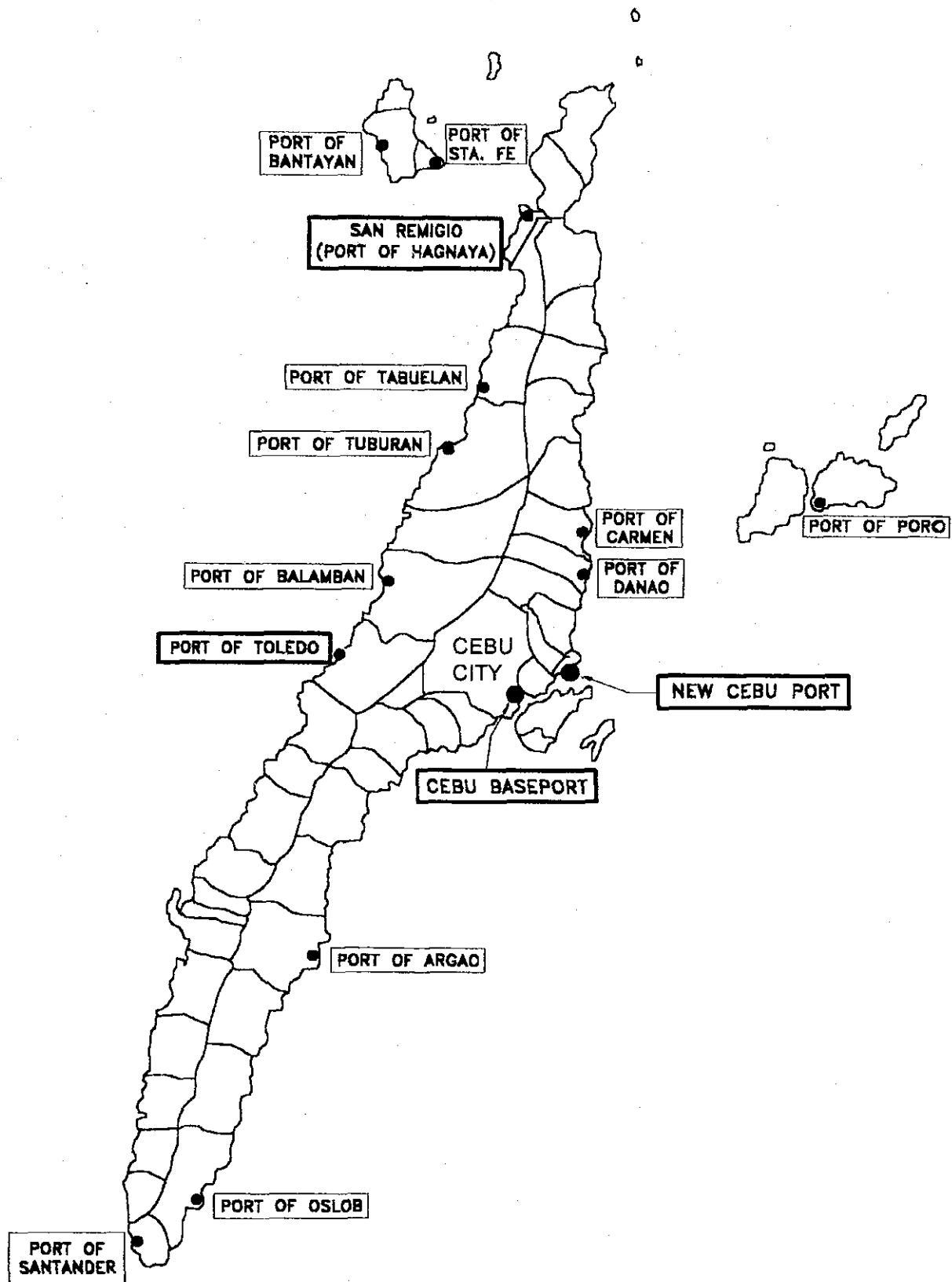


Fig.1.3.1-2 Major Ports in Cebu Province

1.3.2 Implementation of the Study

The Study was implemented as follows.

- (1) Review and analysis of the present condition
- (2) Formulation of a port development policy in Cebu Province, including recommendation on the site of New Cebu Port (Consolacion-Liloan) and two selected major ports for the master plan study (Toledo port and the new San Remigio port)
- (3) Formulation of master plans of Cebu Baseport/New Cebu Port, Toledo port, and the new San Remigio port with a target year of 2020
- (4) Formulation of a short-term development plan and implementation of a feasibility study for Cebu Baseport/New Cebu Port with a target year of 2010

The Study was carried out according to the flowchart shown in Fig. 1.3.2-1

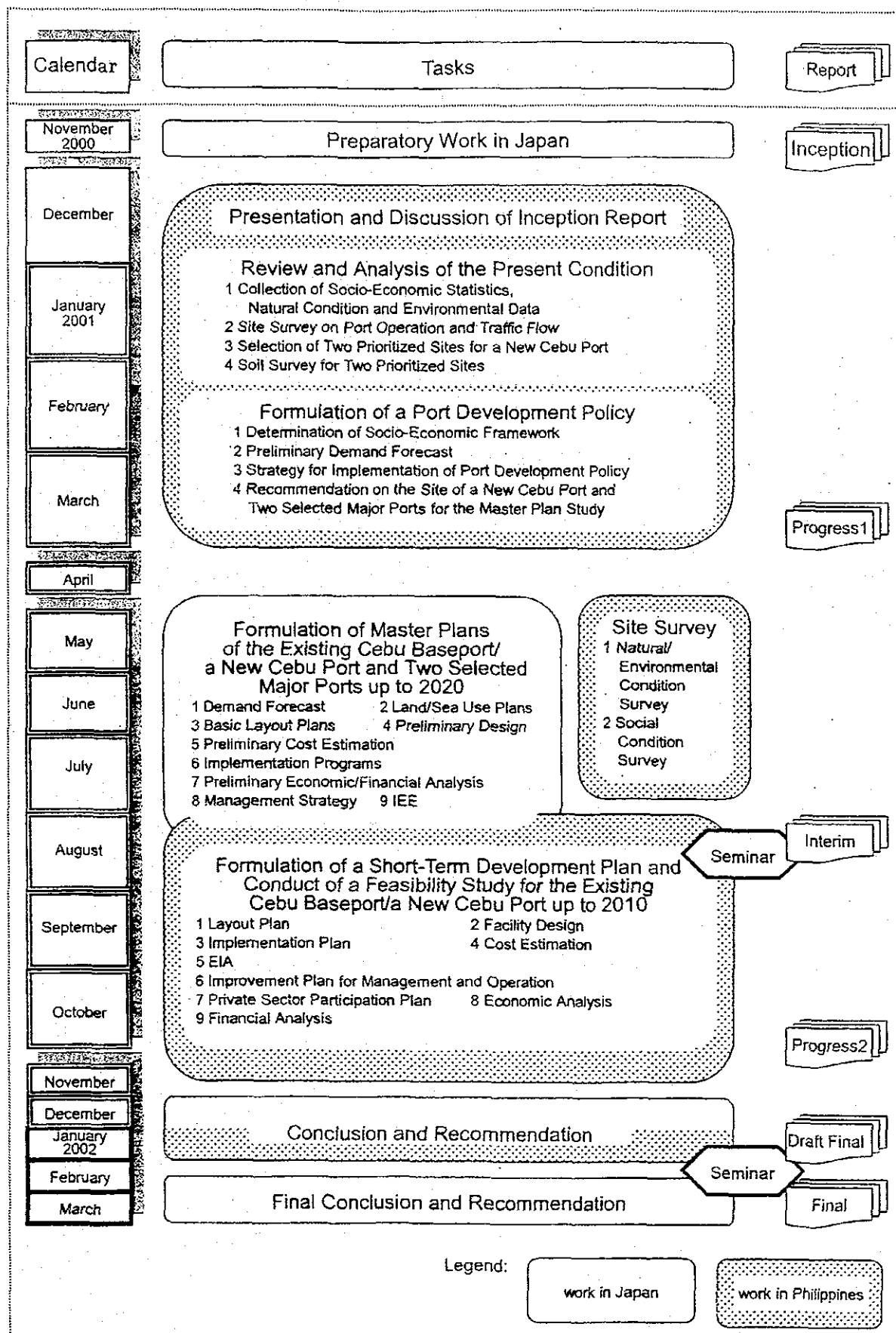


Fig. 1.3.2-1 Flowchart of the Study