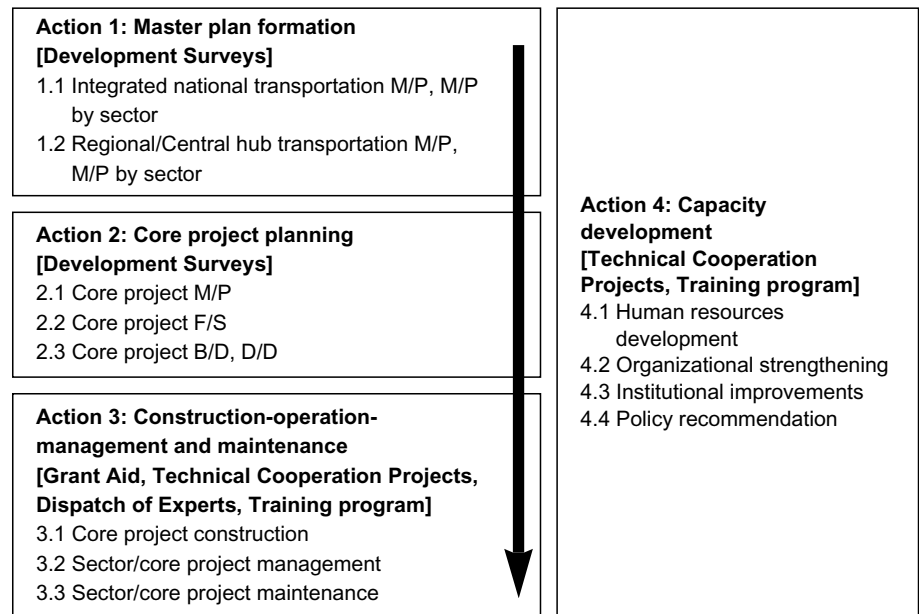


## Appendix 1 JICA's Major Activities

The following demonstrates the flow of JICA's major cooperation activities in the transportation sector organized in chronological order.



As part of the promotion of the program approach at JICA, the following types of activities are being undertaken in the transportation sector. Support that demonstrates a departure from individualized JICA schemes and an awareness of program design strengthening and lifecycle management is being pursued:

- (1) The promotion of program formulation based on Development Studies
- (2) The promotion of organic coordination and integration of various items, such as Development Studies, Technical Cooperation Projects and Training programs
- (3) The strengthening of coordination with Grant Aid activities and volunteer activities in relation to cooperation programs
- (4) The promotion of comprehensive management at the individual program level

Essentially, JICA is pursuing a comprehensive and integrated approach that does not stop at the planning stages shown in Actions 1 and 2 above, and that, through the addition of Actions 3 and 4, aims to materialize proposed projects and ensure the sustainability and ownership of developing countries.

Based on these considerations, shown below are cooperation activities that JICA has engaged in until now, categorized according to the following rules.

### **<Activity Classification Method>**

- To facilitate understanding of the relationship between activities and the Development Objective Chart, activities have been classified according to each Development Objective.
- Activities have been put into subcategories according to their content. Therefore, the subcategories do not necessarily coincide with the Mid-term Objectives and Sub-targets.
- Where activities correspond to several Development Objectives/Mid-term Objectives, they are classified according to their main objective.
- Subcategory lists are given in the following order: Sub-sector    Country  
Period    Scheme.

### **<Using the Activity Outlines as a Reference>**

- For the content of each activity, the proposed tasks (mainly for Development Studies) and details of implementation (mainly for Technical Cooperation Projects, Grant Aid Cooperation, and Training program) have been given.
- The Final Reports of Development Studies are made available internally in Japanese on the JICA Knowledge Site (with some exclusions). Please refer to these for project summaries. Some of these reports are also available on the JICA Library Portal Site, which may also be a useful reference.
- URLs indicating the location of Technical Cooperation Projects and Grant Aid Cooperation on JICA's web site are also given for reference.

Table A 1-1 List of Transportation Sector Activities (Representative Examples)

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Development Objective 1: Capacity Development of the Transportation Sector</b>							
<b>Capacity Development of Regional Governments [Development Study, Technical Cooperation Project]</b>							
1	Roads	East Timor	Periodic Maintenance of Capacity Building for Regional Office	2005.6 ~ 2007.11	Tech. Cooperation Project	1 2 5 4	- Development of systems required for the road maintenance, and repair activities carried out by the Ministry for Transportation, Communications and Public Works (MTCPW), and for restoration activities following road disasters; development of technical personnel required for these activities, such as construction machinery operators and mechanics, and materials and construction managers, providing technical support for appropriate and safe road management and maintenance activities
2	Roads	Kenya	The Study on Rural Roads Improvement in Western Kenya	1999.2 ~ 1999.12	Development Study	1 2 5 1 5 3	- Road network planning and selection of priority roads: development of an improvement plan for rural roads (class C, D, and E roads) in the western region to form a basis for social and economic development - Maintenance plan: inclusion of members from the general public into the road council, establishment of a road register, strengthening of the administrative capacity of the Roads and Public Works Ministry, encouragement of maintenance using appropriate materials and establishment of regional material centers in major regional offices, and establishment of a lease market for construction materials and equipment through the privatization of the Machinery Transportation Department
<b>Establishment and Strengthening of Research and Training Centers [Technical Cooperation Projects, Grant Aid]</b>							
3	General transportation	Philippines	National Center for Transportation Studies Project	1992.4 ~ 1997.3	Project-type Technical Cooperation	1 3	- Establishment of the National Center for Transportation Studies mainly based on the Transportation Training Center (TTC) at the University of the Philippines as the core - Postgraduate education, transportation studies, training, transportation R&D services, information center function
4	Railways	Thailand	Aftercare Technical Cooperation for the Railway Training Center Project	2001.4 ~ 2003.3	Project-type Technical Cooperation	1 3	- Design guidance, supply, installation guidance, and education guidance with respect to training facilities for emergency responses to rolling stock breakdowns - Advice regarding general railway education and training
5	Railways	Iran	Yazd Signaling Training Center Project	1993.12 ~ 1996.11	Project-type Technical Cooperation	1 3 3 2	- Elementary level training course: training for the maintenance of signal equipment - Advanced training course: training for the acquisition of specialist knowledge regarding signals and signal planning techniques - Short-term dispatch of experts, provision of equipment, and creation of textbooks for training
6	Roads	Morocco	Renovation of the Road Maintenance and Construction Equipment of IFEER	1992.4 ~ 1997.4	Project-type Technical Cooperation	1 3	- Implementation of training courses at the Institute of Training on Road Maintenance and Construction Machines - Training course: operation of construction machines, maintaining construction machines (engine, chassis, management), road maintenance
7	Roads	Viet Nam	Basic Design Study on the Project for the Improvement of Transportation Technical & Professional School No. 1	Fiscal 2000 (E/N signed)	Grant Aid (facilities + equipment and materials)	1 3	- Supply of materials required for the creation of a retraining course for experienced personnel in order to cultivate technical personnel for road construction machines - Facilities construction: maintenance training facility, student dormitory, office facilities - Procurement of materials: equipment for maintenance training (rooftop crane, oil pressure testing equipment, etc.), educational equipment (engine cutaway model, transmission cutaway model, etc.), welding and sheet metal work equipment, machine making equipment, vehicle equipment, etc.

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
8	Marine transportation/ ports	Philippines	The Project on Philippine Coast Guard Human Resource Development	2002.7 ~ 2007.6	Project-type Technical Cooperation	1 3 2 1	- Technical support for the establishment of an education and training system for the Philippine Coast Guard (PCG) - Establishment of curriculum, donation of teaching materials and equipment and training of trainers, on subjects of "Law Enforcement," "Search & Rescue," "Safe Navigation," "Marine Environmental Protection," and "Oil Spill Combating," aimed at Coast Guard Education and Training Command (CGETC) (Refer to <a href="http://project.jica.go.jp/english/subject/transport/07_1.html">http://project.jica.go.jp/english/subject/transport/07_1.html</a> )
9	Marine transportation/ ports	Turkey	Port Hydraulic Research Center	1995.1 ~ 1999.12	Project-type Technical Cooperation	1 3	- Technology transfer at the Port Hydraulic Research Center required for planning, design, and implementation of port construction - Areas relating to hydraulic model tests, numerical modeling, and field investigations for wave measurement, and analysis of the collected data, harbor tranquility, wave resistance and sand drift of structures, etc.
<b>Enrichment of Curricula, Manuals, etc. [Technical Cooperation Projects]</b>							
10	Railways	Indonesia	The Project of Modernization of Perumka's Education and Training System in Jabotabek	1992.9 ~ 1997.8	Project-type Technical Cooperation	1 3	- Implementation of theoretical and practical training for personnel at a training center - Curriculum creation, preparation of educational materials, setup of equipment, etc.
11	Shipping/ ports	Philippines	The Project on Philippine Coast Guard Human Resource Development	2002.7 ~ 2007.6	Tech. Cooperation Project	1 3 2 1	- Establishment and operation of a curriculum improvement committee - Revision of course curricula and syllabi, development and implementation of teaching materials and textbooks - Training for instructors - Guidance and training in the operation of donated equipment - Various seminars, advocacy of issues towards various government and private groups involved in maritime affairs
12	Shipping/ ports	Philippines	Promotion of the Ship Inspection System and Technique	2000.9 ~ 2003.9	Project-type Technical Cooperation	1 3 2 1	- Creation of ship inspection guidelines - Creation of ship inspection recording systems - Creation of training materials and guidance materials for ship inspection officers - Creation of training course, formulation of an evaluation system for technology acquisition
13	Shipping/ ports	Philippines	Technology Development for Electronic Navigational Charts	2000.6 ~ 2003.6	Project-type Technical Cooperation	1 3 2 1	- Creation of a system for digitized and systematized hydrographic study on data collection, obtaining maintenance techniques, creation of manuals - Creation of a system and manual for producing and upgrading ENC, execution of operational training, installation of data evaluation equipment - Validation and revision of ENC using a survey ship outfitted ENC equipment - Seminars and workshops on the use of ENC and ENC display equipment
14	Shipping/ ports	Turkey	Project on Improvement of Maritime Education	2000.4 ~ 2005.3	Tech. Cooperation Project	1 3 2 1	- Improvement of navigation, on-board training, and engineering (i.e. engine room) curricula - Establishment and enhancement of laboratories for navigation and engineering subjects - Introduction of curricula using ship-handling simulators and engine room simulators - Enhancement of surveys and research regarding marine safety management, human technology management, and marine environment management - Enhancement and expansion of education and training for experienced seafarers in the Marine Safety and Training Center (MSTC) - Introduction of reeducation using ship handling and engine room simulators - Enhancement of teaching materials and reference materials (Refer to <a href="http://project.jica.go.jp/english/subject/transport/07_1.html">http://project.jica.go.jp/english/subject/transport/07_1.html</a> )
15	Shipping/ ports	Panama	The Panama Nautical School Up-grading Project	1993.10 ~ 1998.9	Project-type Technical Cooperation	1 3	- Creation of syllabus and curriculum for practical training - Operation and maintenance of newly obtained machinery and facilities, and use in practical training - Development of a curriculum for theoretical training, and creation of required study materials - Development of educational methods for theoretical training

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
16	Air traffic/airports	Philippines	The Project for Upgrading Human Resources Development for Air Navigation Systems Specialist at the Civil Aviation Training Center in Manila	1997.10 ~ 2002.9	Project-type Technical Cooperation	1 3 2 1	<ul style="list-style-type: none"> <li>- Planning for a systematic training course, development/revision of curriculum and teaching materials</li> <li>- Planning and implementation for instructor training, creation of guidance manuals for instructors</li> <li>- Introduction to information regarding new technology (CNS/ATM)</li> <li>- Seminars regarding navigational aid systems for university instructors</li> <li>- Development of maintenance personnel for training materials and related facilities, development of a maintenance database</li> </ul>
17	Urban transportation	Brazil	The Urban Transport Human Resources Development Project	1998.8 ~ 2002.7	Project-type Technical Cooperation	1 3	<ul style="list-style-type: none"> <li>- Guidance for creating training curricula</li> <li>- Guidance for creating textbooks</li> <li>- Guidance regarding teaching methodologies, use and maintenance of equipment, and student evaluation methods; introduction to actual Japanese case studies</li> <li>- Guidance relating to study and research for technology development regarding urban transportation planning</li> </ul>
<b>Improving Administration/Privatization [Development Study, Group Training]</b>							
18	Railways	-	Railway Management Planning	Fiscal 2004	Group Training (JICA Tokyo)	1 1 3 2	<ul style="list-style-type: none"> <li>- Objective: Resolution of railway management problems by mid-level managers in the railway management sector</li> <li>- Details: Japanese railway policies, railway management (multiple/diversified management and services), government regulation and support systems for railway entities, etc.</li> </ul>
19	Railways	Bulgaria	Master Plan Study on Long-term Management of Bulgarian Railways	1996.10 ~ 1998.3	Development Study	1 1 3 2	<ul style="list-style-type: none"> <li>- Full implementation of open access, separate account system, transition towards a market-based three department system and rationalization of employee numbers, fees and fare policies tied to the market, establishment of the intermodal transportation system for cargo, increase of railway speeds</li> </ul>
20	Railways	Poland	Study on Privatization of Polish State Railways	1996.10 ~ 1998.2	Development Study	1 1 1 4 3 2	<ul style="list-style-type: none"> <li>- Management style for privatization: Proposal for breakup/privatization and a joint-stock company structure of the Polish State Railways (Polskie Koleje Państwowe [PKP])</li> <li>- Privatization plans: Maintenance of railway transportation, environmental preservation, revision of fares and fees (price raise), division of assets, review of inactive sections of track (abolishment of routes), review of redundant personnel, development of related activities, investment plans, government assistance, capacity development, passenger management, cargo management</li> </ul>
21	Railways	Egypt	Study on Tariffs and Improved Cost Recovery for Egyptian National Railways: Alternative Study	1995.11 ~ 1996.12	Development Study	1 1	<ul style="list-style-type: none"> <li>- Promotion of market-economy-oriented fare and fee policies, enhancement of ticket inspection, shortening of travel time on major lines, modernization of cargo transportation, government compensation for national projects, reduction of personnel, improvement of rolling stock utilization rates, revision of inactive sections of track, market-economy-oriented management organization, system improvements in order to obtain accurate data and information, etc.</li> </ul>
22	Marine transportation/ports	-	Shipping Administration	Fiscal 2004	Group Training (JICA Yokohama)	1 1 3 3	<ul style="list-style-type: none"> <li>- Objective: Capacity development required in relation to maritime policymakers to facilitate development of maritime policy and the formation of a maritime master plan</li> <li>- Details: Maritime administration and management methods</li> </ul>
23	Marine transportation/ports	Egypt	The Study of Management and Development and Operate Plan of the Suez Canal	2000.8 ~ 2001.8	Development Study	1 1 3 3	<ul style="list-style-type: none"> <li>- Estimation/prediction of the amount of vessels passing through the Suez Canal</li> <li>- Managerial and operational policy</li> <li>- Structure of canal passage fees and rates</li> <li>- Marketing system</li> <li>- Proposals for improvement of management and operation</li> <li>- Project evaluation</li> </ul>

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Public-Private Partnerships (PPPs) [Development Study]</b>							
24	Urban transportation	Philippines	The Establishment of the Public-Private Participation Technique of Metro Manila Urban Expressway Construction	2002.1 ~ 2003.3	Development Study	1 1 1 2 1 4	- Development of the PPP technique appropriate to the Metro Manila Urban Expressway Network (MMUEN) (C-3/R-9 to be constructed by the private sector, and R10+R-10/C-5 link by government)
25	Roads	India	Feasibility Study on the Construction of Expressways in the National Capital Region in India	1998.11 ~ 2000.3	Development Study	1 4 3 1	- Planning of the northeastern section, between Kundali and Ghaziabad, of the planned ring expressway near the capital of Delhi - Planning of the section between Ghaziabad and Mellat of the section of the radial expressway that extends northeast from Ghaziabad - Investigation of implementation methods (public acquisition of land, PPP implemented under the assumption of ODA funding)
<b>Enhancement of Special Education Training [Group Training, Technical Cooperation Projects]</b>							
26	Roads	India	Road Administration with Focus on Maintenance and Management, and Safety Measures	2004.2 ~ 2006.2	Tech. Cooperation Project	1 3 3 1	- Technical support aimed at enhancing maintenance of expressways and toll roads, and improving transportation safety in India - Seminars: Maintenance technology for expressways and toll roads; planning, constructing and maintaining road drainage facilities; planning construction and maintenance of composite pavement; inspection of concrete structures; traffic conduction at intersections - Training in Japan regarding expressways and toll roads for Indian technical personnel (Refer to <a href="http://project.jica.go.jp/english/subject/transport/07_1.html">http://project.jica.go.jp/english/subject/transport/07_1.html</a> )
27	Roads	-	Motor Vehicle Inspection and Maintenance System	Fiscal 2004	Group Training (JICA Hachioji)	1 3 1 4	- Objective: Acquisition of technology and expertise in the automobile administration sector with the aim of facilitating the establishment of inspection systems and maintenance systems - Details: Lectures, vehicle inspection practical exercises, etc.
28	Roads	-	Regulation and Type Approval System for Safety and Environmental Protection of Motor Vehicle	Fiscal 2004	Group Training (JICA Tokyo)	1 3 1 4	- Objective: Acquisition of technology and expertise in the automobile administration sector with the aim of facilitating the establishment of standards and certification systems regarding environmental impact and safety - Details: Automobile administration systems; internationalization of vehicle standards; studies regarding safety and adverse effects of automobiles; studies regarding traffic safety measures, efforts of vehicle makers toward safety and the environment; driver licensing systems
29	Roads	-	Seminar on Road Administration	Fiscal 2004/2005	Group Training (JICA Tokyo)	1 3 1 4	- Objective: Qualitative improvements in a wide range of fields including technology for road construction, management and maintenance, and finance and administration - Details: Introduction to Japanese road administration, and road technology (road structural standards, transportation safety, construction management, etc.)
<b>Updating of Transport Laws and Regulations [Group Training]</b>							
30	Roads	-	Road Engineering and Administration	Fiscal 2004	Group Training (JICA Sapporo)	1 3 1 5	- Objective: Improvement of the technical skills of mid-level technical officers in relation to road administration and works - Details: Acquisition of knowledge regarding road related legal systems, budgeting and finance and administration systems, executive organizations concerning roads, inspection and planning, design and construction, maintenance and repair, road management

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Development Objective 2: Toward Internationalization and Regionalization</b>							
<b>Formulation of International Trunk Transportation Network Systems [Development Study]</b>							
31	Roads	Cambodia	The Study on the Construction of Second Mekong Bridge	2004.3 ~ 2005.11	Development Study	2 1 3 1	- Construction of a bridge over the river at Neak Loeng (two ferries currently in operation) that is a transportation bottleneck in Cambodia's National Highway No. 1, preventing it from performing its role as an international road that joins Ho Chi Minh City, Phnom Penh, Bangkok and various major cities in other countries as part of the Asian Highway A-1 Route
32	Roads	Cambodia	The Feasibility Study on the Improvement of National Road No. 1 (Phnom Penh-Neak Loeng Section)	2003.4 ~ 2004.3	Development Study	2 1 3 1	- Refurbishment of the approximately 56 km stretch of National Highway No. 1 between Phnom Penh and Neak Loeng (1.800 km 4 lane section, 54.180 km two lane section, 3 bridge constructions, construction of nine culverts, 7.275 km of road drainage facilities improved, total of 3.86 km of work to prevent slope erosion, improvement of two intersections, etc.)
33	Roads	Multiple countries	The Detailed Design of the Second Mekong International Bridge Construction Project in the Lao People's Democratic Republic and the Kingdom of Thailand	1999.3 ~ 2000.7	Development Study	2 1	- Implementation planning, Environmental Impact Assessment (EIA), project cost estimates, execution planning, formation of maintenance plans and creation of tender documents (drafts) - Roads: Basic design - Bridges: Prestressed concrete (PC) sail type continuous box girder bridge - Cross-border facilities: designed based on international standards that allow integrated BCF (cargo and passengers) usage
<b>Construction and Development of International Ports and Airports [Development Study]</b>							
34	Shipping/ports	Egypt	The Study on the Development Plan of Suez Bay Coastal Area	1985.2 ~ 1986.7	Development Study	2 1	- Construction work: Establishment of industrial complexes and free trade areas, water processing facilities, wastewater treatment facilities, dredging/land reclamation/quays, grain silo terminal, general goods terminal, railway, central district construction facilities, establishment of coastal industrial areas, coastal roads, storm water drainage facilities - Equipment provided: Grain unloader, tugboat, radar system
35	Air traffic/airports	Guatemala	The Study on the Improvement/Construction of the International Airport	2003.5 ~ 2006.3	Development Study	2 1	- Development of access roads between the capital and the new international airport, and development of the area surrounding the new international airport - Formation of a M/P for improvement of the existing airport and construction of the new international airport, and implementation of a F/S regarding the new international airport (implementation based on the spirit of JICA's Guidelines for Environmental and Social Considerations)
36	Air traffic/airports	Viet Nam	Feasibility Study on New Development Plan of Hanoi International Airport	1995.3 ~ 1996.3	Development Study	2 1	- Mid-term Development Project: Construction of runways and adjoining taxiways; construction of the new international passenger terminal and transfer of the T1 passenger terminal to domestic route use; construction of an international cargo terminal; installation of aeronautical safety facilities related to runways and taxiways; installation of facilities for electrical supply, telephones, water supply and sewage, waste processing, and aviation fuel supply; procurement of fire engines and airport maintenance equipment - Long-term Development Plan: Construction of new airport facilities for international routes; use of the existing airport facilities for domestic routes; installation of new runways; connection of existing and new airport facilities with double connection taxiways
37	Air traffic/airports	China	Detailed Design Study on Shanghai Pu-dong International Airport	1996.5 ~ 1997.11	Development Study	2 1	- Development of aviation site (site development, drainage, paving, utilities and fixtures), aviation lights, aviation fueling facilities, firefighting and other emergency facilities
38	Air traffic/airports	Palau	The Project for Improvement of Terminal Building at Palau International Airport	May 2001 (E/N signed)	Grant Aid (facilities + equipment and materials)	2 1	- Construction of facilities and provision of materials and equipment required for construction of the new international airport terminal ensuring the security of terminal users - Facilities: Passenger terminal building, boarding bridges, aprons, parking lots, etc.

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
39	Air traffic/ airports	Honduras	Development of a New International Airport for Tegucigalpa	June 1998 (E/N signed)	Grant Aid (facilities)	2 1	<ul style="list-style-type: none"> <li>- Improvement of runways and installation of warning lights to improve airport safety to combat the frequent occurrence of accidents due to inadequate airport safety facilities</li> <li>- Facilities: Raising of runway pavement and grouping (ditches cut into pavement surface); installation of runway approach lighting system and aircraft warning lights</li> </ul>
<b>Improvement of International Cross-border Transportation Systems [Development Study]</b>							
40	Air traffic/ airports	Philippines	The Study of New Communications, Navigation and Surveillance / Air Traffic Management System	1998.2 ~ 2000.3	Development Study	2 1 2 2	<ul style="list-style-type: none"> <li>- M/P: Long-term development plan for a next-generation aviation system—switch to satellite navigation systems utilizing GPS; switch to air traffic control communication utilizing data communication methods; automation of air traffic control through the utilization of digital data communications; effective use of airspace through the utilization of information technology, and free selection of flight paths through the use of automatic collision avoidance systems; centralization of air traffic control and air traffic control facilities by data communications using satellite technology</li> <li>- F/S: Plan for establishing Manila air traffic control center and centralization of air traffic control and air traffic control facilities to the new Manila air traffic control center, and recommendations regarding the improvement of air traffic control methods</li> </ul>
<b>Facility for the Safety and Security, Designing and Provision of Equipment [Grant Aid, Group Training, Development Study]</b>							
41	Shipping/ ports	-	International Maritime Conventions and Ship Safety Inspection	Fiscal 2004	Group Training (JICA Yokohama)	2 1	<ul style="list-style-type: none"> <li>- Objective: Acquisition of knowledge related to shipping safety and prevention of marine pollution by maritime technology administrative officials</li> <li>- Details: Methods and application of shipping inspection in accordance with IMO conventions and international standards</li> </ul>
42	Shipping/ ports	-	Maritime Search and Rescue and Disaster Prevention Course for Policy Planners	Fiscal 2004	Group Training (JICA Hyogo)	2 1	<ul style="list-style-type: none"> <li>- Objective: To contribute to capacity development related to policy-making and administration through the acquisition of theory and technical knowledge by technical personnel involved in maritime search and rescue and disaster prevention</li> <li>- Details: Maritime search and rescue and disaster prevention theory, trends in international conventions, centralized disaster prevention systems, maritime pollution prevention measures, strategies for natural disasters, etc.</li> </ul>
43	Shipping/ ports	Indonesia	Study for the Maritime Traffic Safety System Development Plan	2001.3 ~ 2002.5	Development Study	2 1	<ul style="list-style-type: none"> <li>- Basic plans for navigation aid systems and maritime radio communication systems</li> <li>- Plans to establish Indonesian ship position notification systems with a view to maritime security and preservation of the marine environment in surrounding seas</li> </ul>
44	Air traffic/ airports	Afghanistan	The Project for Improvement of Equipment of the Kabul International Airport	May 2003 (E/N signed)	Grant Aid (equipment and materials)	2 1	<ul style="list-style-type: none"> <li>- Provision of materials and equipment to improve services at Kabul International Airport and to strengthen security arrangements</li> <li>- Equipment: X-ray inspection equipment for hand luggage, passenger boarding ramps, container dollies, high-lift loaders, catering loaders, water supply vehicles, luggage trolleys for passengers, etc.</li> </ul>
45	Air traffic/ airports	Philippines	The Project for Rehabilitation of the Approach Radar Facility in the Ninoy Aquino International Airport	October 2000 (E/N signed)	Grant Aid (facilities + equipment and materials)	2 1	<ul style="list-style-type: none"> <li>- Construction of facilities and provision of equipment required for improving radar control facilities in order to renew the outdated airport radar monitoring system</li> <li>- Construction of facilities: Antenna tower, radar office, radar approach control office</li> <li>- Procurement of equipment and installation: Radar transmitter/receiver equipment, radar processing facilities, radar display console, control console, power supply equipment, etc.</li> </ul>
46	Air traffic/ airports	Nepal	The Project for Improvement of Existing Air Traffic Services Equipment System under the Tribhuvan International Airport Modernization Project	October 1999 (E/N signed)	Grant Aid (equipment and materials)	2 1	<ul style="list-style-type: none"> <li>- Provision of materials and equipment related to airfield control in order to enhance the reliability of air traffic control at Tribhuvan International Airport</li> <li>- Provision of materials and equipment including airfield control equipment, flight route control equipment, aeronautical communication equipment, weather forecasting equipment, power supply equipment, etc.</li> </ul>



No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
47	Air traffic/ airports	-	Seminar on CNS Technology	Fiscal 2004	Group Training (JICA Tokyo)	2 1	<ul style="list-style-type: none"> <li>- Background: ICAO is attempting to establish a worldwide CNS system based on the Future Air Navigation Systems (FANS) concept</li> <li>- Objective: To encourage the establishment of future air navigation systems by personnel experienced in air navigation and control systems so as to contribute to aeronautical safety</li> <li>- Details: Problem areas in current systems, future air navigation systems (new CNS systems)</li> </ul>
<b>Creation of Mapping Information [Development Study, Technical Cooperation Projects] (Note: Refer to Approaches for Systematic Planning of Development Projects: "Urban and Regional Development")</b>							
48	Urban and regional development	Georgia	The Study on Establishing Digital Topographic Maps	2005.3 ~ 2008.10	Development Study	2 2	<ul style="list-style-type: none"> <li>- Digitized basic national map (1/50,000) of an approximately 30,000 km<sup>2</sup> area of Georgia</li> <li>- Six types of GIS Model Databases for the various Priority Assistance Sectors</li> <li>- Technology transfer related to techniques for creating the abovementioned items, and methods for distribution such as the sale and sharing of geographic information</li> </ul>
<b>Development Objective 3: Toward Balanced Development of a Whole Country [National Transportation]</b>							
<b>Nationwide/Regional Integrated Transportation Master Plan [Development Study]</b>							
49	General transportation	Bosnia and Herzegovina	The Study on the Transportation Master Plan in Bosnia and Herzegovina (BiHTMAP)	1998.11 ~ 2001.3	Development Study	1 1 2 1 3 1 3 2 3 3 3 4	<ul style="list-style-type: none"> <li>- Roads: New bypass/dedicated roads for automobiles, current road improvements/widening/paving, etc.</li> <li>- Railways: Improvements to railway facilities (restoration of rolling stock and carriage facilities, signaling and communication facilities, improvement of track facilities)</li> <li>- Air traffic: Short-term project in conformity with ICAO standards to achieve safe operation</li> <li>- Inland water transportation: Rehabilitation of the Sava River shipping system</li> <li>- Establishment of a transportation training center</li> </ul>
50	General transportation	Viet Nam	The Study on the National Transportation Development Strategy in Viet Nam	1999.1 ~ 2000.7	Development Study	1 1 2 1 3 1 3 2 3 3 3 4	<ul style="list-style-type: none"> <li>- Formation of long-term, mid-term, and short-term plans up to 2020 aimed at the whole country and all transportation modes in order to efficiently advance improvements to transportation systems as the basis for economic progress</li> <li>- Roads: Improvements to roads and bridges</li> <li>- Railways: Repairs and small-scale improvements</li> <li>- Ports and ships: Improvement, expansion, and development of ports and harbors</li> <li>- Air transportation: Expansion and development of airports</li> </ul>
51	General transportation	Viet Nam	Master Plan Study on the Transportation Development in the Northern Part in Viet Nam	1993.6 ~ 1994.6	Development Survey	3 1 3 2 3 3	<ul style="list-style-type: none"> <li>- Transportation systems for the whole northern region excluding airports with a target year of 2010</li> <li>- Roads: Improvement of National Highways 1, 2, 18, 70, and 379, and improvements to bridges on national and rural roads (10 projects)</li> <li>- Railways: Improvement of passenger transportation on the Hanoi to Hai-phong line, upgrade of the Sanlam Rolling Stock Factory and improvements to cross-border transportation (9 projects)</li> <li>- Ports: Improvement and development of ports at Hai-phong and Cai Lan</li> <li>- Inland water transportation: Upgrades to ports at Ninh Binh, Hanoi, and Viet Tri, dredging and improvement of major and other waterways</li> </ul>
52	General transportation	Pakistan	The Study on National Transportation Plan (8th 5-year Plan)	1994.1 ~ 1995.2	Development Survey	3 1 3 2 3 3 3 4	<ul style="list-style-type: none"> <li>- Proposal of an investment program for the eighth 5-year Plan</li> <li>- Roads: Improvements of dedicated roads for automobiles, national route improvements, rural road improvements</li> <li>- Railways: Track upgrades, improvements to signaling systems, reinforcement of carriages, improvements to electricity and information systems, etc.</li> <li>- Ports: Improvements to ports at Karachi and Qasim, etc.</li> <li>- Airports/air traffic: Airport improvement projects, aviation-related projects</li> </ul>

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Sector-specific Infrastructure Improvement Project Survey/Policy Recommendations (Aimed at National and Central Hub Transportation)</b>							
53	Roads	Oman	Study in the Roads Network Development	2004.1 ~ 2005.2	Development Survey	3 1	- M/P: Plans for national road network improvement between 2006 and 2030 for primary and secondary national routes - Pre-F/S: Plans to form the basis for the road sector plan for the seventh 5-year National Development Plan between 2006 and 2010
54	Roads	Indonesia	Road Network Study in Central and South-East Sulawesi	1997.3 ~ 1998.12	Development Survey	3 1	- M/P: A total of 6,552 km of road extensions - Pre-F/S: 1,200 km of road extensions, target year of 2008, plan for improvement of paved surfaces, bridge plans, sloped-surface preservation plans, tunnel plans
55	Roads	Angola	The Project for Improvement of Road Network in Luanda	Fiscal 1998/1999 (E/N signed)	Grant Aid23.533	3 1 4 2	- Improvement of major trunk roads in urban areas with the aim of rapidly restoring the functionality of roads destroyed by civil wars - Improvement of roads and road surfaces for major trunk roads within Luanda state that connect with the surrounding regions, construction such as road structural elements including drainage for areas under construction, lighting, traffic safety equipment and installations
56	Railways	Syria	The Master Plan Study on the Development of Syrian Railways	2000.4 ~ 2001.8	Development Survey	3 2	- M/P: (Syrian national railway) Rehabilitation and modernization of existing facilities, construction of new lines, (Hejas railway) rehabilitation of existing facilities - F/S: (Syrian national railway) Plan for improvement of the sections among Tartous, Homs, and Al Sharki (rehabilitation and improvements to tracks and electrical facilities, construction of new signal stations, double tracking plans), modernization plan for the locomotive factory
57	Railways	Indonesia	Study on the Detailed Design Study of Railway Electrification and Double Tracking of Java Main Line Project	1984.12 ~ 1986.2	Development Survey	3 2	- Railway electrification - Construction of new electrical substations for electric locomotives, passenger carriages, and freight cars, and adoption of automated and token-less signaling system
58	Shipping/ ports	Indonesia	The Study on Development of Domestic Sea Transportation and Marine Industry in Republic of Indonesia	2002.12 ~ 2004.3	Development Survey	1 1 1 2 3 3	- Examination of the public financing system for ship improvements - Maritime management: Strengthening management foundations through the integration and affiliation of small ship companies, consignment of ship administration to specialist ship administration companies, provision of opportunities for advanced management education, coordination with the international cooperation initiative advocated by ISO and IMO with the aim of modernizing the domestic shipping industry - Support for the formation of an advanced maritime education program
59	Shipping/ ports	Indonesia	The Study for Development of the Greater Jakarta Metropolitan Ports of Indonesia	2002.3 ~ 2003.9	Development Survey	3 3	- Port development and management and operation strategies with respect to the West Java region - Development of the Tanjung Priok Port and the Bojonegara Port, master plan and short-term improvement plans regarding management and operation
60	Shipping/ ports	Indonesia	The Study for Port Development Strategy in the Republic of Indonesia	1997.11 ~ 1999.3	Development Survey	3 3	- Strategy for port improvements and enhancement - Strategy for port financial administration and privatization - Strategy for port administration, and management and operation
61	Shipping/ ports	Philippines	The Study on the Master Plan for the Strategic Development of the National Port System	2002.11 ~ 2005.1	Development Survey	3 3	- Master plan related to improvement of the national ports network with a target year of 2024
62	Shipping/ ports	Philippines	The Study on the Cebu Integrated Port Development Plan (Preparatory Study)	2000.12 ~ 2002.3	Development Survey	3 3	- Improvement of the existing port and construction of a new port at Cebu - International trade container terminal, multipurpose international trade terminal, access roads, wharf upgrades, improvements to passenger ship terminal building, Ro/Ro wharf, high-speed vessel wharf, cargo ship wharf, yard, passenger ship terminal, etc.

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
63	Shipping/ports	Thailand	The Master Plan Study for the Coastal Channels and Ports Development	2001.1 ~ 2002.12	Development Study	3 3	- M/P: Plans for the expansion of one general domestic cargo berth and one Ro/Ro cargo berth at Songkla Port, plans for work to prevent coastal erosion through a sand bypass for shipping route 10 - F/S: Plans for coastal preservation measures in relation to the domestic shipping berth and one Ro/Ro ship berth for general domestic cargo, plans for additional training walls to prevent losses to fishing villages and the filling in of waterways, plans for construction to prevent coastal erosion and re-sand bypass work
64	Shipping/ports	Ghana	The Development Study of Ghana Sea Ports	2000.11 ~ 2002.1	Development Study	3 3	- Takoradi Port facilities improvement: Container berth, multipurpose berth, manganese berth, bauxite/clinker berth, small vessel pier, navigation aid facilities, tugboats, etc. - Tema Port facilities improvement: container berth, navigation aid facilities, tugboats, new approach waterway, new turning circle, container yard, etc.
65	Shipping/ports	Turkey	The Study on Long Term National Port Development Plan	1999.7 ~ 2000.9	Development Study	3 3	- Port improvement strategy: Introduction of a port improvement system using port ratings (selection of trunk ports), improvement strategy for container port facilities, long-term plans (container berth extension), short-term plans (container terminal improvements, general cargo terminal improvements) - Port management strategy, port investment strategy, systematic framework creation strategy, port operation strategy, environmental consideration policy
66	Air traffic/airports	Philippines	Master Plan Study on the Development of National Airports	2004.12 ~ 2006.3	Development Study	3 4	- Formulation of an airport improvement policy to act as a guideline for national airport improvement, maintenance, management and operation through the creation of an airport facilities ledger, etc. - Improvement of airport security - Reestablishment of the roles of the various airports based on airport type and functional allocation - Recommendation of practical policies, reflecting ideas such as securing means of revenue creation, in order to contribute to the re-examination of organizational systems and the efficient reform and upgrade of airports
67	Air traffic/airports	Indonesia	The Master Plan Study for the Strategic Policy of the Air Transportation Sector	2003.2 ~ 2004.7	Development Study	2 1 3 4	- Formation of long-term policies for the aviation sector, and creation of improvement plans and proposals regarding safety control, aviation security, aircraft accident investigations, airport improvements, improvements to aeronautical safety systems, etc. - Strengthening of government functions: Strengthening of the safety supervising function, strengthening of the aviation security and air transportation policymaking functions, strengthening of the aviation accident investigation and accident prevention functions - Organizational restructuring in relation to service functions: Establishment of a single ATS provider, transfer of airports managed by the Directorate General of Air Communications (DGAC) to Angkasa Pura I (API), Angkasa Pura II (APII), and regional governments - Support for safe and efficient air transportation: Development of airport subsectors, development of the CNS/ATM sub-sector
68	Air traffic/airports	Uzbekistan	The Study on Air Transport Development	1997.4 ~ 1998.6	Development Study	3 4	- Improvement of the existing airports: Expansion of the domestic passenger and cargo building, renewal of the firefighting office, new airport surface detection equipment (ASDE), runway extension, improvement of paved surfaces, extension of the passenger building, control tower, renewal of navigation aid facilities - Construction of new airports: new airports with facilities mainly for international routes - National navigation aid facilities: Replacement of NDB with VOR/DME at eight locations
69	Air traffic/airports	Kazakhstan	The Study on Air Transport Development	1995.3 ~ 1997.3	Development Study	3 4	- M/P: Air transportation total development plan - F/S: Runway extensions and improvements, new terminal facilities, improvements to aviation security facilities, expansion of aprons, etc.

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Infrastructure Development Project by Sector (Core Projects) [Development Study, Grant Aid]</b>							
70	Roads	Nepal	The Feasibility Study on the Construction of Kathmandu-Naubise Alternate Road	2000.3 ~ 2001.3	Development Study	3 1	<ul style="list-style-type: none"> <li>- Construction of high-standard bypass roads (approximately 21.4 km, 2 lanes)</li> <li>- Newly constructed tunnel (length: 705 m, 2 lanes)</li> <li>- F/S regarding natural energy generation to supply electricity for tunnel management and maintenance</li> <li>- Construction of a truck terminal near the Kathmandu outer ring road</li> </ul>
71	Roads	Cambodia	The Project for Construction of a Bridge over the Mekong River	Fiscal 1996/1997 (E/N signed)	Grant Aid (facilities)	3 1	<ul style="list-style-type: none"> <li>- Construction of a bridge at the section divided by the Mekong River of National Route 7, a major trunk road</li> <li>- Construction of 1 km main bridge (PC box girder bridge, 2-lane road), 360 m approach bridge (PC girder bridge, 2-lane road), approach road (2-lane paved road)</li> </ul>
72	Shipping/ ports	Kiribati	The Project for Development of Betio Port	May 1997 (E/N signed)	Grant Aid (facilities + equipment and materials)	3 3	<ul style="list-style-type: none"> <li>- Construction of facilities and provision of equipment required for the improvement of coastal wharves and container yards at Betio Port</li> <li>- Improvements to wharves, container yards, and access roads; construction of a cargo warehouse, administration office, and passenger terminal, etc.; cargo handling equipment</li> </ul>
<b>Improvement of Travel System [Development Study]</b>							
73	Railways	Philippines	The Study on the Standardization for Integrated Railway Network of Metro Manila	2000.2 ~ 2001.3	Development Study	1 2 1 4 2 1 3 2	<ul style="list-style-type: none"> <li>- Plan for improving the open space outside the station (project for installation of bus and jeepney terminals, footpaths, installation and improvement of access roads)</li> <li>- Project for improvement of facilities outside the station (improvements/installation of escalators, elevators, open access ways, etc.)</li> <li>- Direct connection project (northern Manila railway and southern Manila railway, LRT 1 and 3)</li> <li>- Project for reorganizing bus and jeepney routes with stations as central</li> <li>- Establishment of task forces with a view to implementation of integrated transportation policies and plans</li> <li>- Program for establishing an urban development fund</li> <li>- Program for capacity development in the railway sector</li> <li>- Development plan for residential area integrated with the railway</li> </ul>
74	Railways	Viet Nam	The Feasibility Studies on the Rehabilitation and Improvement of Railway in Viet Nam	1994.2 ~ 1996.1	Development Study	3 2	<ul style="list-style-type: none"> <li>- M/P: Improvement and repair of all slow-moving sections, and upgrades to emergency systems, tracks, signals, communications, and carriage maintenance</li> <li>- F/S: Improvements to passenger and cargo services, improvements to tracks, bridges, signals, and communications, installation of optical cables, installation of telephone exchanges, laying of tracks, improvement of tourist transportation, gauge conversion work</li> </ul>
<b>Operation and Maintenance System [Development Study, Grant Aid]</b>							
75	Roads	Kenya	Study on the Utilization of Private Sector in the Road Maintenance System	2000.11 ~ 2003.1	Development Study	1 3 3 1	<ul style="list-style-type: none"> <li>- More efficient utilization of existing resources for road maintenance systems</li> <li>- Proposal of programs for training, education and capacity development in relation to road maintenance project</li> <li>- Creation of road maintenance manuals</li> </ul>
76	Roads	Bosnia and Herzegovina	The Project for Procurement of Road Construction Machinery	Fiscal 1998 (E/N signed)	Grant Aid (equipment and materials)	3 1	<ul style="list-style-type: none"> <li>- Cooperation for the acquisition of road construction machinery, such as asphalt plants and bulldozers, with the aim of restoring national trunk lines and other destroyed roads within Sarajevo</li> </ul>
77	Roads	Turkey	The Study on Arterial Highway Maintenance	1997.3 ~ 1998.7	Development Study	3 1	<ul style="list-style-type: none"> <li>- Maintenance and inspection manuals</li> <li>- Evaluation and repair manuals</li> <li>- Implementation plan of a road maintenance system</li> <li>- Implementation plan for 18 selected subdivisions</li> </ul>
78	Roads	Turkey	The Study on the Maintenance and Rehabilitation of Highway Bridges	1995.3 ~ 1996.8	Development Study	3 1	<ul style="list-style-type: none"> <li>- Maintenance of bridges (repair, maintenance and reconstruction of significantly damaged portions, maintenance of bridges where alkali-aggregate reactions, etc. are evident)</li> </ul>

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
79	Railways	Mongolia	Project for Repairing Railways	November 2000 (E/N signed)	Grant Aid (facilities + equipment and materials)	2 1	<ul style="list-style-type: none"> <li>- Upgrade work and procurement of equipment for basic railway facilities such as bridges and embankments for railways that perform important roles in long-distance domestic transportation and international transportation</li> <li>- Construction of facilities: Rock fall prevention measures, construction/improvement of river retaining walls, improvement/construction of lateral drainage ditches for railway lines, etc.</li> <li>- Procurement of equipment: Bulldozers, truck cranes, dump trucks, etc. (equipment required for the construction of basic railway line facilities)</li> <li>- Improvement work such as construction to prevent rock falls, bridge repair work, lateral drainage work, etc., technical support for preservation and maintenance of facilities</li> </ul>
80	Railways	Mongolia	The Feasibility Study on the Rehabilitation Project of the Mongolian Railway	1996.7 ~ 1998.2	Development Study	3 2	<ul style="list-style-type: none"> <li>- Improvement plans for basic facilities and bridges for railway lines suffering deterioration</li> <li>- M/P: Improvement plans including measures to prevent erosion of embankments, rock falls, flooding of tracks, and measures for improving bridges, and lateral railway line drainage</li> <li>- F/S: Improvement plans including measures to prevent erosion of embankments, rock falls, and measures for improvements to bridges, and lateral railway line drainage (outline design)</li> </ul>
81	Railways	Uzbekistan	The Feasibility Study on the Construction of Electric Locomotive Repair Workshop	1996.11 ~ 1997.8	Development Study	3 2	<ul style="list-style-type: none"> <li>- Construction of a repair factory for electric locomotives</li> </ul>
82	Shipping/ ports	Mozambique	The Study for Maintenance and Improvement Plan of Access Channel of Beira Port	1997.1 ~ 1998.2	Development Study	3 3	<ul style="list-style-type: none"> <li>- Introduction of a dredging vessel for port maintenance dredging</li> </ul>
<b>Normalization and Standardization [Development Study]</b>							
83	Roads	Philippines	Feasibility Study on Upgrading Inter-Urban Highway System (Sta. Rita-San Jose Road Section)	1998.1 ~ 1999.12	Development Study	3 1	<ul style="list-style-type: none"> <li>- New construction for a wide area bypass road, conversion of sections of that road to meet higher standards including improvement plans for access roads</li> <li>- Construction of bypass roads in three urban areas along the Pan-Philippine Highway (Philippine-Japan friendship highway) between Plaridel and San Jose</li> </ul>
84	Roads	Malaysia	The Study on the Standardization of Bridge Design	1994.8 ~ 1996.8	Development Study	1 4 3 1	<ul style="list-style-type: none"> <li>- Development of a computerized design and drawing system, and creation of standard design drawings and manuals (planning, design, budgeting, execution) with the aim of standardizing bridge design</li> </ul>
<b>Intermodal Transportation Improvement (Issues common to all modes of transportation)[Development Study]</b>							
85	Shipping/ ports	Indonesia	The Study on the Master Plan of Container Cargo Handling Ports, Dry Ports and Connecting Railways	1994.3 ~ 1995.6	Development Study	3 5 2 2	<ul style="list-style-type: none"> <li>- M/P: Plans for advancing the national container handling port network, and railway container transportation in connecting areas at hinterlands of five national ports (new loading facilities at the port of Tanjung Priok, plans for new lines including Pasoso station)</li> <li>- F/S: Short-term railway improvement plans for priority ports, dry ports, and the Jakarta metropolitan region, improvement/construction of container terminal at multipurpose pier (yard plans, cargo handling machinery, improvement/construction of the container terminal [dry port] at the hinterlands of ports)</li> </ul>

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Disaster and Disaster Prevention [Development Study]</b>							
86	Roads	Nicaragua	The Study on Vulnerability Reduction for Major Roads	2002.1 ~ 2003.1	Development Study	3 5	- M/P: Investigations regarding safety levels, and determination of sections requiring improvements for disaster prevention on the routes in question - F/S: Work proposals for disaster prevention improvement at the specified areas, creation of five types of manuals (surveying, planning, design and construction, maintenance, and design standards and technical drawing compilations)
87	Roads	Malaysia	Slope Disaster Management Study for Federal Highways	2000.10 ~ 2002.3	Development Study	1 3 3 5	- Improvement of the training implementation system for public and private road technicians in the field of road construction and maintenance at the Institute of Training on Road Maintenance and Construction Machines (Institut de Formation aux Engins et a l'Entretien Routier Skhirat [IFEER]), which is the only specialist training organization for the management, operation and repair of construction machinery - Formation of guidelines for road embankment management, development of a supporting information system, organizational reforms required for the implementation of road embankment management, formation of capacity development plans
<b>Development Objective 4: Toward Sustainable Urban Development and Improvement of Urban Life</b>							
<b>Study on Integrated Urban Transportation and Formulation of Master Plan [Development Study]</b>							
88	Urban transportation	Kenya	The Master Plan and Feasibility Study to Alleviate Traffic Congestion and Improve Traffic Safety in the Nairobi Metropolitan Area	2004.7 ~ 2005.10	Development Study	4 1 4 2 4 3 4 4 4 5	- Formation of an integrated urban transportation strategy that includes "hard" improvements such as improvements to the road network, intersection upgrades, and the implementation of other traffic facilities, and "soft" considerations such as systems improvements - Implementation of a pilot project (intersection improvement) to verify the effects of works
89	Urban transportation	Peru	The Master Plan for Lima and Callao Metropolitan Area Urban Transportation	2003.12 ~ 2005.6	Development Study	4 1 4 2 4 3 4 4 4 5	- Formation of an integrated long-term urban transportation plan (target year: 2025) with the objective of ameliorating various urban transportation problems in Lima, such as traffic congestion, traffic accidents, and atmospheric pollution; and creation of improvement plans and investment plans based on that
90	Urban transportation	Viet Nam	The Study on Urban Transport Master Plan and Feasibility Study in HCM Metropolitan Area (HOUTRANS)	2002.8 ~ 2004.6	Development Study	4 1 4 2 4 3 4 4 4 5	- Proposal of seven basic objectives, 35 strategies, and 105 action plans aimed at achieving the vision for transportation development - Basic objectives: Promotion of social understanding with respect to large city transportation problems, management of continuous large city growth, development of an attractive public transportation system, effective road transportation management, integrated improvements to transportation spaces and environments, enhancement of transportation safety, strengthening of the administrative foundations of urban transportation
91	Urban transportation	Indonesia	The Study on integrated Transportation Master Plan for JABODETABEK (Phase II) (SITRAMP)	2001.11 ~ 2004.3	Development Study	4 1 4 2 4 3 4 4 4 5	- Formation of a transportation master plan for the JABODETABEK region - Urban transportation policy: Promotion of public transportation use, amelioration of traffic congestion, reduction of air pollution and noise, reduction of traffic accidents and improvements to public security
92	Urban transportation	Egypt	Transportation Master Plan and Feasibility Study of Urban Transport Projects in Greater Cairo Region (Phase II) (CREATS)	2003.2 ~ 2003.12	Development Study	1 1 1 3 4 2	- Integrated improvements in the urban transportation sector, including upgrade/construction of infrastructure, and the systems and human resources to support it, with the aim of creating the key systems for the formation of a new urban structure for the Greater Cairo Region - Program A: Program for the improvement of major public transportation corridors and district transportation management - Program B: Improvement program for the Cairo Transportation Agency (CTA) public transportation service in the eastern districts of Cairo

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
93	Urban transportation	Romania	The Comprehensive Urban Transport Study of Bucharest City and Its Metropolitan Area	1998.7 ~ 2000.3	Development Study	4 1 4 2 4 3	- M/P: Formation of a transportation master plan combining enhancements to ring roads and improvements to public transportation facilities (development of public transportation along multiple axes) with an emphasis on trams - Priority projects: Connection of inner ring roads with overpasses, improvement of bottleneck spaces, development of inner-city parking systems, development of a new public transportation corridor, and improvement of the fare systems
94	Urban transportation	Cambodia	The Transport Master Plan of the Phnom Penh Metropolitan Area	2000.3 ~ 2001.10	Development Study	4 1 4 2 4 3	- Roads: Improvements to paved surfaces in urban areas, construction of roads and bridges in outer areas - Public transportation: 1,306 buses, related facilities, and other items - Transportation administration: Improvements to traffic signals in urban areas = 117 signals, other - Organizations and legal systems: Organizational reform, capacity development, legal system upgrades
<b>Provision of Basic Urban Transportation Infrastructure and Maintenance System [Development Study]</b>							
95	General transportation	Thailand	The Study on Greater Bangkok Truck Terminal	1991.2 ~ 1992.9	Development Study	4 1	- Construction of a public truck terminal facility (including: platform, apron, parking lots, administration office, service station [repair facility, fueling station, vehicle washing facilities], greenbelts, and roads)
96	Roads	Philippines	The Study on the Improvement of Existing Bridges along Pasig River and Marikina River	2002.9 ~ 2004.4	Development Study	4 4	- Evaluation of the soundness of the 17 bridges under survey, bridge improvement M/P (target year: 2023), F/S on priority bridge improvements (target year: 2013), ship collision avoidance measures - Technology transfer: Survey and evaluation of the soundness of bridges, planning methods for urban civil engineering projects (including transportation management plans)
97	Roads	Philippines	Study on Upgrading Inter-Urban Highway System along the Pan-Philippine Highway (Plaridel, Cabanatuan, San Jose Bypass)	1998.11 ~ 1999.11	Development Study	4 1	- Construction of three bypass roads at points of traffic congestion on the Philippines-Japan friendship Highway
98	Roads	Malaysia	The Feasibility Study on Kuala Lumpur Outer Ring Road Project	1995.3 ~ 1996.7	Development Study	4 1	- Construction of a ring road to connect Kuala Lumpur's North-South Expressway and North-South Central Link Expressway (tunnels, bridges, etc.)
99	Urban transportation	Colombia	Feasibility Study on the Project of Highway and Bus Lane of Santa Fe de Bogota	1998.3 ~ 1999.7	Development Study	4 1 4 3	- Construction of an inner-urban elevated expressway - Improvement of major bus roads for 10 routes
<b>Improvement of Public Transportation Services [Development Study, Grant Aid]</b>							
100	Urban transportation	Philippines	The Feasibility Study of the Proposed Cavite Busway System	2001.12 ~ 2002.9	Development Study	4 2	- Formation of plans for busways in the Cavite district - Technology transfer: Technology and techniques for transportation planning, busway operation and management, legal system development, and site acquisition
101	Urban transportation	China	Study for Public Transportation Improvement in Chengdu City	2000.3 ~ 2001.7	Development Study	4 2	- M/P: Establishment of dedicated bus lanes, establishment of bus priority lanes, bus-related facilities, plans for upgrading transportation management facilities, plans for improving policies, systems, etc. - F/S: Trunk lanes of dedicated bus lanes, bus priority lanes, bus-related facilities (bus stations, transfer points, bus stops), plans for improving transportation management facilities, plans for improving policies, systems, etc.
102	Urban transportation	Azerbaijan	Urban Transportation Improvement in the City of Baku	2000.8 ~ 2002.3	Development Study	4 2	- M/P: Public transportation plan, road plans, transportation management plans - F/S: Plans for introducing motor coaches (60 coaches, installation of bus stops), improvements to five bottleneck locations (roads), tram upgrade plans, plans for introducing centralized traffic control system, intersection improvement plans

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No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
103	Urban transportation	Philippines	The Study on Metro Manila Urban Transportation Integration	1996.3 ~ 1999.3	Development Study	4 2	- MRT/LRT/Busways: Routes 1 and 6, route 2, route 3, route 4, north rail, and MCX - Roads: Improvements to expressways, trunk roads, and semi-trunk roads
104	Urban transportation	Mongolia	The Project for Improvement of Public Transportation in Ulan Bator	1994 ~ 1995	Grant Aid (facilities + equipment and materials)	4 2	- Provision of materials and equipment - Provision of a bus maintenance factory - Technology transfer guidance from Japanese maintenance technicians (cooperation volunteers) - Long-term expert dispatch to act as an operations and management director
<b>Post-disaster Restoration of Public Transportation Services [Grant Aid]</b>							
111	General transportation	Afghanistan	The Project for Rehabilitation of the Public Transportation System in Kabul City	March 2003 (E/N signed)	Grant Aid (equipment and materials)	4 2 4 4	- Provision of materials and equipment for improving the public transportation environment, which is plagued by breakdowns due to deterioration and destruction from civil conflict, and for resolving the inadequacy of transit buses for international airport passengers - Inner-city route buses (coach buses, minibuses), airport buses, spare parts, repair equipment, etc.
112	General transportation	Serbia and Montenegro	Rehabilitation of the Public Transportation Capacity in Belgrade City	April 2002 (E/N signed)	Grant Aid (equipment and materials)	4 1 4 4	- Provision of materials and equipment in order to ensure bus transportation capacity, and in particular the transportation capacity of inner-city routes that experience concentrated use, since these are common everyday forms of transportation for urban residents, including the large numbers of refugees and internally displaced persons that live in the city - Materials and equipment for coupled buses, coach buses, and maintenance workshops
113	Urban transportation	Bosnia and Herzegovina	Basic Design Study Report on the Project for Rehabilitation of Mostar City Transportation System	May 2001 (E/N signed)	Grant Aid (equipment and materials)	4 2 4 4	- Provision of equipment and material for the restoration of Mostar City bus routes that have suffered damage from civil conflict - Provision of coupled buses, coach buses, coach buses (lowered floors), mini-buses, spare parts, and workshop tools
<b>Transportation Demand Management [Development Study]</b>							
105	Urban transportation	Thailand	The Study on Improvement of Road Traffic Environment in Chiang Mai	2001.7 ~ 2002.9	Development Study	4 1 4 3 4 4	- Intersection improvements (construction of new traffic lights, addition of pedestrian lights to existing controlled intersections) - Construction of new traffic lights - Traffic light improvements (ATC connection) - Addition of pedestrian lights - Pedestrian and bicycle networks in older urban districts - Improvement of hazardous areas
<b>Strengthening of Transportation Safety Measures [Development Study, Overseas Basic Study, Grant Aid]</b>							
106	Urban transportation	Viet Nam	Study on Road Traffic Safety in Hanoi	2004.2 ~ 2005.1	Overseas Basic Survey	4 4	- Implementation of the traffic safety campaign (1 month x 3 times) (1) Ensuring a safe flow of traffic at intersections (changes to left turning lanes), ensuring an orderly and safe flow of traffic (division of lanes according to vehicle type) (2) Increased awareness for traffic safety of motorbike users, management to ensure safe driving by bus drivers (3) The correct way for pedestrians and bicycles to cross roads
107	Urban transportation	Nepal	The Project for Improvement of Intersections in Kathmandu City	February 2001 (E/N signed)	Grant Aid (D/D + facilities)	4 4	- Construction of facilities required for the improvement of major intersections in Kathmandu City - Installation of traffic lights, alterations to intersection layouts, installation of sidewalks, installation of gutters, etc.
108	Urban transportation	Thailand	The Study on an Improvement Plan for Railway Transport in and around the Bangkok Metropolitan in Consideration of Urban Development	1993.5 ~ 1995.10	Development Study	1 1 4 2	- Formation of a M/P that integrates urban development and railway improvements in the Bangkok metropolitan area - Proposal of a F/S for the SRT east line, 2nd International Airport Branch Line (model urban development plan with stations as central, railway improvement plans [improvements for work commuters, electrification of the 2nd International Airport Branch Line, inter-city express transportation])



No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
109	Urban transportation	Thailand	Traffic Safety Plan for Roads	1983.5 ~ 1984.12	Development Study	4 4	<ul style="list-style-type: none"> <li>- Data collection and analysis</li> <li>- Determination of hazardous areas</li> <li>- Installation guidelines for safe facilities</li> <li>- Safe facility plans</li> <li>- Study on methods for creating mid to long-term plans for safe facility installations/improvements</li> </ul>
<b>Disaster Prevention Measures [Development Study]</b>							
110	Roads	Thailand	The Study on Road Disaster Prevention Plan	1993.11 ~ 1995.5	Development Study	4 2	<ul style="list-style-type: none"> <li>- F/S: Selection of project roads, selection of 38 potential disaster areas for the creation of outline designs</li> <li>- Creation of disaster prevention manuals</li> </ul>
<b>Development Objective 5: Toward Sustainable Rural Development and Improvement of Rural Life</b>							
<b>Maintenance and Designing of Basic Infrastructure [Development Study, Grant Aid]</b>							
114	Roads	Viet Nam	The Project for Reconstruction of Bridges in the Northern District	1993 ~ 1995 (cooperation period)	Grant Aid (facilities)	5 1	<ul style="list-style-type: none"> <li>- Construction of new and reconstruction of existing small to medium bridges on auxiliary roads in northern agricultural and mountainous areas or on regional residential roads</li> <li>- Bridge construction, provision of steel girders</li> </ul>
115	Roads	Philippines	Feasibility Study on Road Network Improvement for Development of Regional Growth Centers	2003.3 ~ 2005.8	Development Study	4 1 5 1	<ul style="list-style-type: none"> <li>- Formation of a master plan for a road network project, involving national routes and rural roads, in relation to road improvements in order to relieve traffic congestion in central rural cities and to support regional economic progress</li> <li>- Advice regarding road network planning methods that utilize regional characteristics, and regarding work implementation methods that involve collaboration between central government and rural governments</li> </ul>
116	Roads	Philippines	The Project for Construction of Bridges along Rural Roads in Northern Luzon	June 2002 (E/N signed)	Grant Aid (facilities + equipment and materials)	5 1	<ul style="list-style-type: none"> <li>- Procurement of steel materials for bridges and execution of technically difficult bridge construction work for unconstructed bridges in rural road networks</li> <li>- Provision of steel materials for bridge construction, bridge construction (government bond)</li> </ul>
117	Shipping/ports	Samoa	The Project for Construction of the Inter-islands Navigation Vessel	Fiscal 1997 (provision)	Grant Aid (equipment and materials)	5 1	<ul style="list-style-type: none"> <li>- Provision of passenger transportation ferries to take the place of ships decommissioned due to deterioration</li> <li>- Installation of fire detection systems, firefighting equipment, and sprinkler systems, as well as lifeboats and life rafts in accordance with SOLAS standards regarding ferries</li> </ul>
118	Air traffic/airports	Thailand	The Study on Airport Development Master Plan in the Kingdom of Thailand	1998.3 ~ 2000.1	Development Study	5 1	<ul style="list-style-type: none"> <li>- Selection of five priority airports regarding improvements from the approximately 30 regional airports</li> <li>- Expansion of existing airports (Lampang, Mae Hong Son, Phrae) and construction of new airports (Betong, Mukdahan) to deal with future expected increases in air transportation demand</li> </ul>
119	Air traffic/airports	Philippines	The Study on Selected Airports Master Planning Project	1996.3 ~ 1997.3	Development Survey	5 1	<ul style="list-style-type: none"> <li>- M/P: Survey of proposed sites for new airports, development of the existing airports</li> <li>- F/S: Construction of new airports</li> </ul>
<b>Introduction of Appropriate Technology [Grant Aid]</b>							
120	Roads	Morocco	The Project for Improvement of Equipment for Rural Roads	December 2000 (E/N signed)	Grant Aid (equipment and materials)	5 3	<ul style="list-style-type: none"> <li>- Provision of materials and equipment required for improvements to village roads in rural areas</li> <li>- Bulldozer, wheel loader, motor grader, hydraulic shovel, vibrating roller, dump truck, watering truck, truck trailer, oil supply truck, utility truck, air compressor, etc.</li> </ul>
121	Roads	Guatemala	The Project for Improvement of Equipment for Rural Road Construction	Fiscal 1998 (E/N signed)	Grant Aid (equipment and materials)	5 3	<ul style="list-style-type: none"> <li>- Provision of seven convoys (new machines) and supporting equipment to reinforce the rural convoy system that covers 6,150 kilometers of road with urgent needs for improvement in 159 municipal cities, in nine peaceful provinces</li> <li>- Securing access to markets and traffic flow throughout the year in rural villages, and access to public services in isolated villages by improvement of transportation system</li> </ul>

Approaches for Systematic Planning of Development Projects / Transportation

No.	Sub-sector	Country	Activity Name	Period	Scheme	Mid-term Objective	Content (s) of Activity
<b>Designing for Improvement of Rural Life [Development Study]</b>							
122	Urban/ regional	Palau	The Study for Promotion of Economic Development	2000.2 ~ 2000.8	Development Survey	5 2	- M/P (transportation sector): Roads: Improvements to connecting roads, improvements to national roads; Airports: International airport runway extension; Ports: Port expansion - Pre-F/S: Tourism development plan, solid waste disposal management program
123	Urban/ regional	Indonesia	The Development Study on Comprehensive Regional Development Plan for the Western Part of Kalimantan	1997.3 ~ 1999.3	Development Survey	5 2	- Long-term comprehensive development plan: Formulation of a development plan with priority development areas and river basin divisions specified by spatial planning, formulation of an environmental M/P for development that is consistent across river basin areas, social infrastructure improvements for small to medium rural cities and farm villages, improvements to multi-transportation adequate for goods transportation, creation of plans for the diversification of industries and products, including capacity development - Transportation sector priority projects: Trans-Kalimantan highway improvement project, Pankalambun-Kumai city, industrial and ports development project master plan survey, Kalimantan upland rural infrastructure development project for poverty reduction measures
<b>Disaster Prevention Measures and Post-disaster Recovery [Grant Aid Cooperation]</b>							
124	Roads	Nepal	The Project for the Urgent Rehabilitation of Sindhuli Road (Section IV)	July 2003 (E/N signed)	Grant Aid (facilities)	5 1	- Restorative and preventative works on roads and road structural elements that were damaged in record heavy rainfalls in which numerous landslides and cave-ins occurred and road structural elements were washed away and destroyed, etc
125	Roads	Bangladesh	The Project for Improvement of Portable Street Bridges for Feeder Roads	June 2001 (E/N signed)	Grant Aid (facilities)	5 1	- Constructing necessary bridges and improving bridges on feeder roads that are frequently damaged during the rainy season - Procurement of materials for portable steel bridges required for the construction of 74 footbridges