

IMPERIAL COUNTY

EMERGENCY MEDICAL SERVICES AGENCY

TRIAL STUDY

RURAL EMT-1 EXPANDED SCOPE OF PRACTICE

(ADVANCED EMT-1)

IMPERIAL COUNTY
RURAL EMT-1 EXPANDED SCOPE OF PRACTICE

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**IMPERIAL COUNTY
RURAL EMT-1 EXPANDED SCOPE OF PRACTICE**

PROGRAM APPLICATION

REQUEST FOR APPROVAL
RURAL EMT-I EXPANDED SCOPE OF PRACTICE
TRIAL STUDY

DATE: 10/20/95

INTRODUCTION:

Small, rural communities are scattered across Imperial County in isolated locations. In addition to year-round residents, these communities attract large numbers of elderly residents ("snowbirds") during the winter season. Many of the residents have chronic illnesses, and EMS calls in those communities involve conditions that may benefit from ALS treatment, especially chest pain and respiratory distress.

These areas are 30-45 minutes from existing ALS units. We have attempted to help these communities maintain ALS, but that proved to be impossible. Typically a paramedic will join a small ambulance service for a short period of time, and then leave due to the isolation, low call volume, and low pay. Simply maintaining EMT-basic level response and transport is difficult. The large time commitment for EMT-II training makes that option impossible.

We are proposing an expansion of the scope of practice for EMT-Is in several isolated communities so that selected ALS skills and medications can be provided. Initial communities would be Bombay Beach, on the eastern shore of the Salton Sea, that includes the "Fountain of Youth" spa; Niland, which also serves the "slabs", a large, informal community of mobile homes in the hills east of the Salton Sea; the Desert Shores/West Shores area on the western shore of the Salton Sea; and, possibly, one or two additional areas, depending on interest and resources. (Please see attached summary of communities and map).

NAME OF PROPOSED PROCEDURE OR MEDICATION:

The expanded scope would include:

1. Combitube
2. Automated External Defibrillation (already approved and in use)
3. Determination of blood glucose levels
4. Medications
 - A. Albuterol, metered dose inhalers or nebulized *SOP*
 - B. Activated Charcoal
 - C. Aspirin
 - D. Epinephrine via EpiPen (or similar device) *SOP*
 - E. Glucagon *?*
 - F. Naloxone
 - G. Nitroglycerin, sublingual/lingual preparations *SOP*

MEDICAL CONDITIONS:

The expanded scope of practice will be used in clinical conditions that warrant treatment under the following treatment protocols:

Allergic Reaction and/or Anaphylaxis
Altered Neurologic Function (Non-traumatic)
Cardiopulmonary Arrest
Chest Pain (suspected cardiac origin)
Near Drowning
Poisoning
Respiratory Distress
Smoke, Gas and Toxic Substance Inhalation

PATIENT POPULATION:

Patients who fit the Treatment Guidelines above (see below), who are residents of the communities involved in the study.

RELEVANT STUDIES:

There is growing recognition that formerly advanced skills may be performed, at least to a limited extent, by basic personnel. The new Department of Transportation EMT-Basic curriculum includes an optional module for endotracheal intubation, and EMTs assisting patients with their own nitroglycerin, glucose solutions, epinephrine injections, and bronchodilators.

A recent abstract reported that EMT-basics successfully performed endotracheal intubation in

46% of candidate patients (Sayre, et al: Field Trial of Endotracheal Intubation by Basic EMT's. Scientific Abstracts National Association of EMS Physicians, 1995). Another recent paper reported on the successful use of epinephrine by rural EMTs among a small group of patients with anaphylaxis (Fortenberry et al: Use of Epinephrine for Anaphylaxis by Emergency Medical Technicians in a Wilderness Setting. Ann Emerg Med, June 1995).

PROPOSED STUDY DESIGN:

EMTs will be selected for this program based on satisfactory performance as an EMT-basic and EMT-D. They will be evaluated for their likelihood to remain in the community, and must satisfactorily complete a screening evaluation by their provider agency, EMS agency staff, and the base hospital coordinator. Candidates will be evaluated by a pre-test. All individuals initially selected will be members of a local fire department or employed by an ambulance provider. We anticipate a first class of six individuals, two each from three providers in separate areas.

Didactic education will total 40 hours, followed by two 8 hour clinical sessions in a hospital emergency department and two 8 hour field clinical sessions with an ALS unit and paramedic preceptor. In each location the EMT must successfully complete five ALS contacts. A summary of the lesson plans is attached. The complete curriculum is available for review upon request.

We anticipate the expanded scope EMT-Is will respond to the majority of EMS calls in their communities, but, depending on days off, they may not always be available. They will initiate the study ALS procedures using standing orders and base hospital contact. In the Bombay Beach and West Shores areas they will transport the patient to a hospital with treatment en-route, although in selected cases they may arrange for a rendezvous with an ALS unit. In the Niland area, the expanded scope EMT-Is will be part of the first response agency only, and will be met on-scene by an ALS unit. Patients generally will be transported to Pioneer's Hospital in Brawley (Imperial County), although occasionally they may be transported north into Riverside County.

Continuing education will be provided (see CME requirements). The study will continue for 18 months, and then be evaluated for extension. All required reports will be submitted to the EMS Authority.

The program's effectiveness will be evaluated in several ways. First, the expanded scope EMTs' retention of knowledge, assessment skills and skills performance will be evaluated by post-tests after routine CME, and randomly at other times.

Second, all patient contacts will be reviewed to evaluate EMT performance. There will be an evaluation of patient assessment, including congruence with hospital diagnosis; documentation; appropriateness and performance of field interventions, including whether interventions were actually performed when indicated; and, patient outcome, measured by change in vital signs and outcome. We will use a simple 1-10 analog scale for reporting progression or improvement of symptoms.

Third, for all cases the estimated time interval will be recorded that ALS would have been provided without the availability of the expanded scope EMT. The reason for any rendezvous with paramedics will be recorded.

We anticipate patients will receive ALS interventions more quickly, that patient conditions will improve during treatment, that any deterioration in a patient's condition will be attributable to the underlying medical problem. In the initial phase our end-points will be accurate assessments congruent with later hospital diagnosis, the provision of correct treatments when indicated, and an estimated decrease in the time interval to the administration of these treatments. We recognize that in some cases now there is not 100% congruence between ALS assessments and hospital diagnoses.

If resources allow in the future, we will attempt to compare this treatment regimen to outcomes without this regimen (BLS only).

MEDICAL CONTROL:

Medical control will be through the specific expanded scope EMT-I Treatment Guidelines (attached) and base hospital contact. All patient contacts will be reviewed by the Base Hospital Coordinator (a Registered Nurse) and/or EMS Agency staff (paramedic) within seven days. All cases will be reviewed by the medical director. The EMS Agency will establish policies and procedures regarding certification, continuing education, data collection, and other operational procedures.

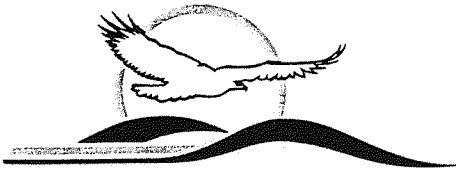
TRAINING AND COMPETENCY TESTING:

Training will follow a curriculum and lesson plans adapted from the Imperial Valley College paramedic training program. A summary is attached. Training sessions will be conducted by the EMS coordinator (see attached CV). Competency testing, both written and skills examinations, will be included in the training program. There will be both hospital clinical time and field preceptorship time, as outlined above.

Continuing education and on-going evaluation of competence will be provided according to the schedule attached.

MEDICAL ADVISORY COMMITTEE:

The study proposal was reviewed and approved by a local medical advisory committee composed of emergency medical technicians, nurses, physicians, trainers, and base hospital personnel active in the EMS system. Letters of endorsement are available.



El Centro
REGIONAL MEDICAL CENTER

1415 Ross Avenue · El Centro, CA 92243-4398 · (619) 339-7100

September 23, 1995

John W. Pritting, EMS Coordinator
935 Broadway
El Centro, Calif. 92243-2306

RE: Advanced EMT/1 Trial Study

Dear John:

Today I had the opportunity to review the Imperial County Emergency Medical Services Agency Trial Study, Rural EMT/1 Expanded Scope of Practice. I found this study to be very thorough, and very well prepared. The map illustrations were excellent as well.

I think that this program would be an asset to the Imperial Valley community and once approved should be implemented immediately.

I think this is extremely important in view of the fact that rural communities are scattered across Imperial County.

This will be extremely important for the residents who are 30 to 60 minutes away from ALS units for major medical emergencies. I feel that EMT-1's with this expanded scope of practice would be extremely beneficial to residents or visitors. I feel that the expanded scope of practice for the EMT-1's would greatly benefit the citizens to these rural communities. I feel that the overall medical care for the community would improve dramatically.

Keep up the good work!

Sincerely,

Uri Guéfen, M.D.,
EMS Medical Director

UG/mln

September 27, 1995

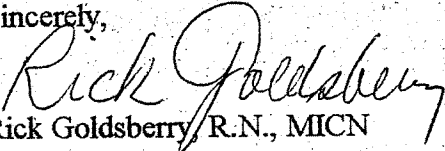
Mr. John Pritting, EMS Coordinator
Emergency Medical Services
Imperial County Health Department
935 Broadway
El Centro, CA 92243

Dear John,

I have reviewed the information that you sent to me concerning the "Trial Study" for Advanced EMT-I program that is proposed. I am delighted to report that although I was at first skeptical of such an idea, I am impressed with the idea now. As you well know, I am a strong believer in quality EMS, this plan certainly includes quality assurance if implemented as the plan describes.

I want you to know that as a citizen of this county I am proud of your efforts, now and in the past, to improve our EMS system. This is another example of your desire to improve our situation here. If there is any way I can be of assistance with this program please don't hesitate to call on me.

Sincerely,


Rick Goldsberry, R.N., MICN

**IMPERIAL COUNTY
RURAL EMT-1 EXPANDED SCOPE OF PRACTICE**

DESCRIPTION OF COMMUNITIES

DATA COLLECTION
FOR CONSIDERATION OF
RURAL EXPANDED-SCOPE EMT-1

Report for FY '95 Ending 06/30/95

WEST SHORES AMBULANCE SERVICE - is a private, non-profit, subscription supported ambulance service that services the communities of Desert Shores and Salton Sea Beach located along the west bank of the Salton Sea. These communities have a stable population of approximately 3,000 and a visitor population of 2,000 - 3,000 more during the winter months. There is no real industry that supports these communities. Most of the residents and visitors are retired seniors. Patients are transported to either Pioneers Memorial Hospital in Brawley or to JFK Hospital in Indio - both of which are located approximately 45 miles away.

TOTAL CALLS THIS YEAR - 435
MONTHLY AVERAGE - 36

<u>CALL TYPE</u>	<u>PERCENT OF TOTAL</u>
Vehicle Accidents	19%
Difficulty Breathing	11%
Chest Pain	8%
CPR	8%
Altered Neurologic Function	11%
All others	43%

<u>LEVEL OF CARE</u>	<u>PERCENT OF TOTAL</u>
EMT-P	6%
EMT-II	3%
EMT-1	91%

BOMBAY BEACH RESCUE AMBULANCE SERVICE - also a private, non-profit, subscription supported ambulance service that services the community of Bombay Beach which is located along the eastern shore of the Salton Sea. Bombay Beach is a wilderness community with a stable population of approximately 2600 and a visitor population of an additional 4000 (mostly retired seniors) who reside at the "Fountain of Youth" Spa just east of town. Patients are transported to either Pioneers Hospital in Brawley or JFK in Indio - both of which are approximately 45 miles from town.

TOTAL CALLS THIS YEAR - 316
MONTHLY AVERAGE - 26

<u>CALL TYPE</u>	<u>PERCENTAGE OF TOTAL</u>
Vehicle Accidents	23%
Difficulty Breathing	8%
Chest Pain	11%
CPR	8%
Altered Neurologic Function	11%

All others 39%

<u>LEVEL OF CARE</u>	<u>PERCENTAGE OF TOTAL</u>
EMT-P	0%
EMT-II	0%
EMT-1	100%

NILAND FIRE DISTRICT - a rural first responder fire service located approximately 20 miles north of Brawley where the nearest ALS ambulance is stationed. The town of Niland is classified as rural and is supported primarily by agriculture. Niland has a stable population of approximately 1,280 and a visitor population (the majority of whom are retired elderly) of approximately 3,000 during the winter months. Many of the visitors will camp at the "slabs" approximately 5 miles east of town (the remnants of a W.W.II military installation) during the winter months - an area without plumbing or electricity.

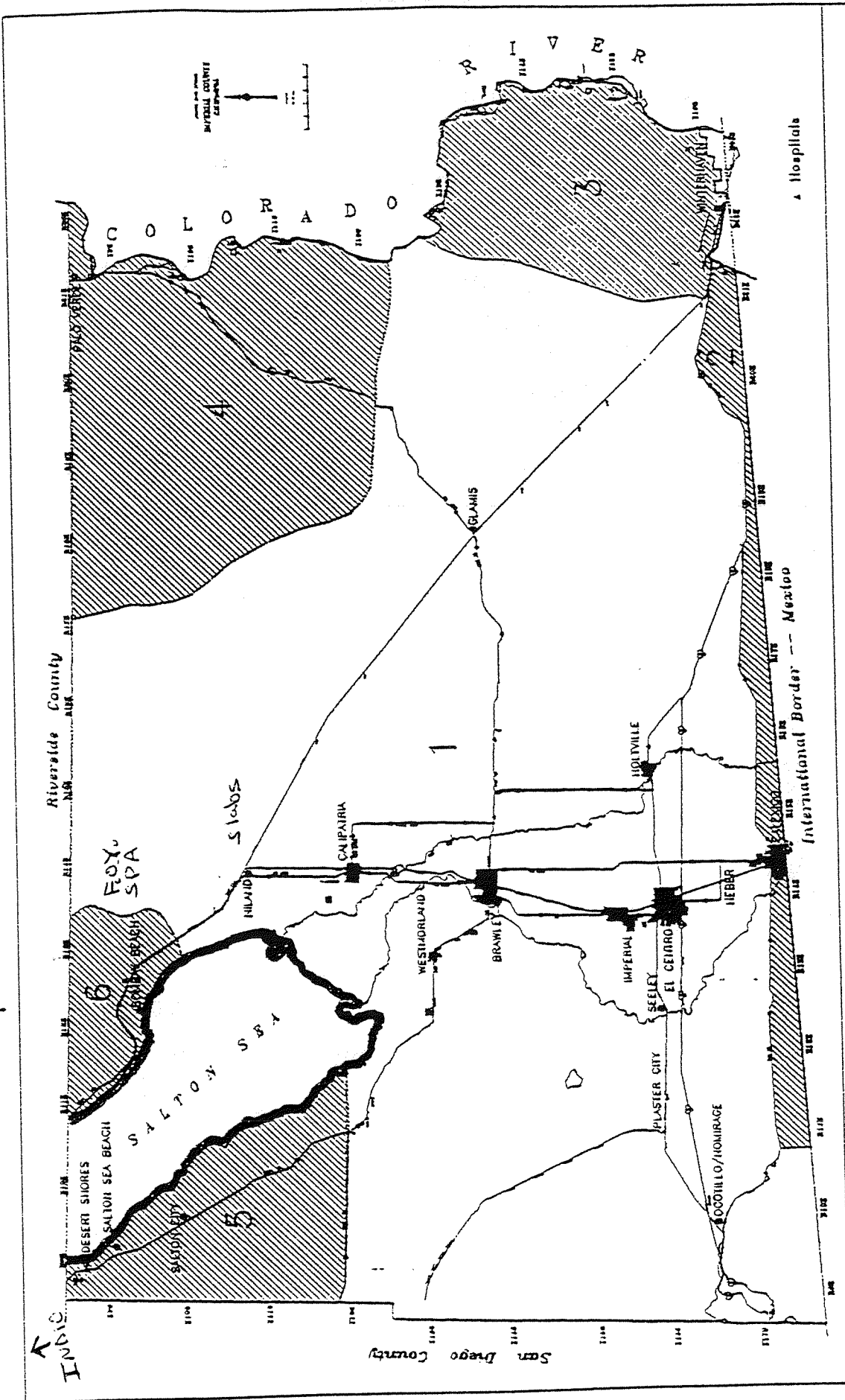
TOTAL CALLS THIS YEAR - 544

MONTHLY AVERAGE - 45

AVERAGE ON-SCENE TIME PRIOR TO ARRIVAL OF AMBULANCE - 32 MINUTES

<u>CALL TYPE</u>	<u>PERCENTAGE OF TOTAL</u>
Vehicle Accidents	36%
Difficulty Breathing	26%
Chest Pain	20%
CPR	2%
Altered Neurologic Function	7%
All others	9%

<u>LEVEL OF CARE</u>	<u>PERCENTAGE OF TOTAL</u>
EMT-1	100%



IMPERIAL COUNTY (AMBULANCE DISTRICTS) - 1994
 Imperial County Planning/Building Department
 County of Imperial, California (1994)

**IMPERIAL COUNTY
RURAL EMT-1 EXPANDED SCOPE OF PRACTICE**

CURRICULUM VITAE

COURSE DIRECTOR

JOHN WILLIAM PRITTING

671 Sequoia Street * Imperial, California 92251
(619) 352-5664

EDUCATION

UNIVERSITY OF PHOENIX Imperial County Extension
Bachelor of Science - Business Administration

UNIVERSITY OF CALIFORNIA San Diego, California

Fulfilled requirements to obtain California Community College
Instructor Credential for subject area of Health and Physical
Care Services and Related Technologies

UNIVERSITY OF CALIFORNIA San Diego, California

Mobile Intensive Care Paramedic Course

PROFESSIONAL EXPERIENCE

IMPERIAL COUNTY HEALTH DEPARTMENT Present Employer
Imperial County, CA

Emergency Medical Services Coordinator

RESPONSIBILITIES:

- * Develop, implement, evaluate, and enforce system-wide policies and procedures which govern the medical, operational and administrative functions of the EMS system
- * Negotiate and administer service provider contracts
- * Organize and coordinate the various EMS activities of government and private agencies
- * Coordinate the quality improvement program to ensure medical accountability in all stages of the system
- * Monitor basic and advanced life support training programs to ensure compliance with State regulations and as part of the quality improvement program
- * Coordinate, in cooperation with users, the EMS communication system
- * Develop and maintain plans and procedures for a coordinated emergency medical response to catastrophic disasters
- * Conduct continuing medical education training courses for EMS system participants
- * Provide staff support to EMS councils and committees

SCHAEFER'S AMBULANCE SERVICE November 1975 - August 1994
Los Angeles, CA

Regional Manager
San Diego & Imperial County Operations

RESPONSIBILITIES:

- * Responsible for all phases of operations for two divisions to include staffing, training, contract negotiations, bid proposals, billing, work schedules, and fleet maintenance (combined fleet of 23 vehicles) * Supervised beginning management levels and field operations * Identified transportation and scheduling conflicts to produce optimal unit utilization *

ACHIEVEMENTS:

- * Four years management experience;
- * Negotiated and secured the following contracts:
 - ▶ Imperial County "911" ALS contract and Exclusive Operating Area for all emergency ambulance service;
 - ▶ University Hospital & Medical Center, San Diego for all transports to include: CCT, Neonate, BLS, Air & Ground ambulance service;
 - ▶ Balboa Naval Hospital, San Diego, for all transports to include: CCT, Neonate, BLS, Air & Ground ambulance service;
- * Established and coordinated air ambulance service in San Diego County (Montgomery Field) as subdivision of Schaefer's Air Service, Los Angeles.

Paramedic, Field Supervisor
Imperial County Division

RESPONSIBILITIES:

- * Supervise daily performance of paramedics and EMTs to ensure quality of care and service and compliance with contract requirements * Maintain, revise, and implement field safety and training programs and associated manuals * Maintain adequate staffing of paramedics and EMTs through recruitment and training *

ACHIEVEMENTS:

- * Fifteen years experience as MIC Paramedic;
- * Ten years experience as Field Supervisor;
- * Ten years experience as Field Training Officer;
- * Voted by peers to be Imperial County "Advanced Life Support Provider of the Year 1990"

IMPERIAL VALLEY COLLEGE
Imperial, CA

September 1982 - June 1994

Emergency Medical Services Training Instructor

RESPONSIBILITIES:

- * Primary instructor for the following programs: Emergency Medical Technician - I, II, and Paramedic, Mobile Intensive Care Nurse, First Responder, CPR/BLS, and Advanced Cardiac Life Support
- * Developed learning objectives, lesson plans, testing and grading criteria *

ACHIEVEMENTS:

- * Developed curriculum for first "Mobile Intensive Care Nurse" program to be offered in Imperial Valley *

BOULEVARD FIRE DEPARTMENT
Boulevard, Ca

August 1984 - November 1987

Captain, Firefighter

RESPONSIBILITIES:

- * Medical Officer - provide training for initial certification and recertification for CPR/BLS, First Responder, and Emergency Medical Technician-I through local community college
- * Maintain adequate medical supplies and equipment
- * Oversee firefighters in the performance of their duties to ensure quality medical care and service
- * Perform required duties as Firefighter to ensure public safety *

ACHIEVEMENTS:

- * Conducted first EMT-1 Training Program through Imperial Valley College for fire department first responders in east San Diego County. A total of 36 volunteer firefighters from Boulevard, Jacumba, and Ocotillo Volunteer Fire Departments received EMT-1 certification *

COMMUNITY AFFILIATIONS

EMS Administrators Association of California
Imperial County Emergency Medical Care Committee
Binational Emergency Medical Care Committee
American Heart Association
California Rescue Paramedic Association
Imperial Valley Fire Chief's Association



No 249607

The California Community Colleges

JOHN WILLIAM PRITTING

The Board of Governors of the California Community Colleges, acting in accordance with the authority vested in it, awards to the person named above an

Instructor Credential

12

This document, earned by meeting the provisions established by law and the requirements established by the Board of Governors of the California Community Colleges, authorizes the holder to perform all services permitted by these provisions and requirements.

Subject Matter Area: HEALTH AND PHYSICAL CARE SERVICES
AND RELATED TECHNOLOGIES*****

María Camara

President, Board of Governors
California Community Colleges

Donald C. Hyland

Chancellor
California Community Colleges

VALID FOR LIFE

Issued: JULY 7, 1989

**IMPERIAL COUNTY
RURAL EMT-1 EXPANDED SCOPE OF PRACTICE**

TREATMENT PROTOCOLS