



Charity reg. No.
228636

The ECT Accreditation Service (ECTAS)

Standards for the administration of ECT

Standards and criteria have been categorised as follows:

Type 1: failure to meet these standards would result in a significant threat to patient safety, rights or dignity and/ or would breach the law

Type 2: standards that an accredited clinic would be expected to meet.

Type 3: standards that an excellent clinic should meet.

These standards relate to the process of administration of ECT and in this regard are consistent with NICE guidance. They do not relate to clinical decisions about which patients should be given ECT.

Third Edition edited by Joanne Cresswell, Lauren Rayner and Chloë Hood

Third Edition December 2005 Pub No. CRU033

The Royal College of Psychiatrists' Research Unit
4th Floor, Standon House, 21 Mansell Street, London, E1 8AA
www.rcpsych.ac.uk/cru



Foreword

We are pleased to introduce the third edition of the ECTAS standards and appreciate the continuing collaborative effort to improve the quality of the administration of ECT.

These standards have been developed from a literature review and in consultation with stakeholder groups. These standards also cover the NICE Health Technology Appraisal of ECT. Attempts have been made to include information from a wide range of sources and to take into account the views of both clinic staff and service users.

The standards are intended to provide staff with a clear and comprehensive description of best practice in the administration of ECT. They are reviewed each year, so please give the project team any comments, using the form provided at the back of this booklet.

These standards will be applied each year in self- and external peer-review by ECTAS member clinics. If you work in an ECT clinic, we hope you will continue to support the network and join in the review cycle.

Dr Chris Freeman Consultant Psychiatrist and on behalf of the Royal
College of Psychiatrists

Dr John Bowley Consultant Anaesthetist and on behalf of Royal College
of Anaesthetists

Sue Hinchliffe Head of Accreditation, Royal College of Nursing

Contents

Introduction	iv
Section One The ECT Clinic and Facilities	1
Section Two Staff and Training	5
Section Three Assessment and Preparation	9
Section Four Consent and Information Giving	12
Section Five Anaesthetic Practice	14
Section Six The Administration of ECT	16
Section Seven Recovery, Monitoring and Follow up	17
Section Eight Special Precautions	19
Section Nine Protocols	20
Bibliography	21
Feedback Form	22
Contact Details	23

Introduction

The accreditation standards have been drawn from key documents including the ECT Handbook (Royal College of Psychiatrists, 2005), the NICE Appraisal of ECT (National Institute for Clinical Excellence, 2003) and the Scottish National Audit of ECT (CRAG Working Group on Mental Illness, 2000). They have been subject to extensive consultation with all professional groups involved in ECT and with service users and their representative organisations.

The standards cover the following topics:

- The ECT Clinic and Facilities
- Staff and Training
- Assessment and Preparation
- Consent
- Anaesthetic Practice
- The Administration of ECT
- Recovery, Monitoring and Follow up
- Special Precautions
- Protocols

These standards relate to the process of administration of ECT and in this regard are consistent with NICE guidance. They do not relate to clinical decisions about which patients should be given ECT.

The full set of standards are aspirational and it is unlikely that any clinic would meet all of them. To support their use in the accreditation process, each standard has been categorised as follows:

- **Type 1:** failure to meet these standards would result in a significant threat to patient safety or dignity and/or would breach the law;
- **Type 2:** standards that an accredited clinic would be expected to meet;
- **Type 3:** standards that an excellent clinic should meet.

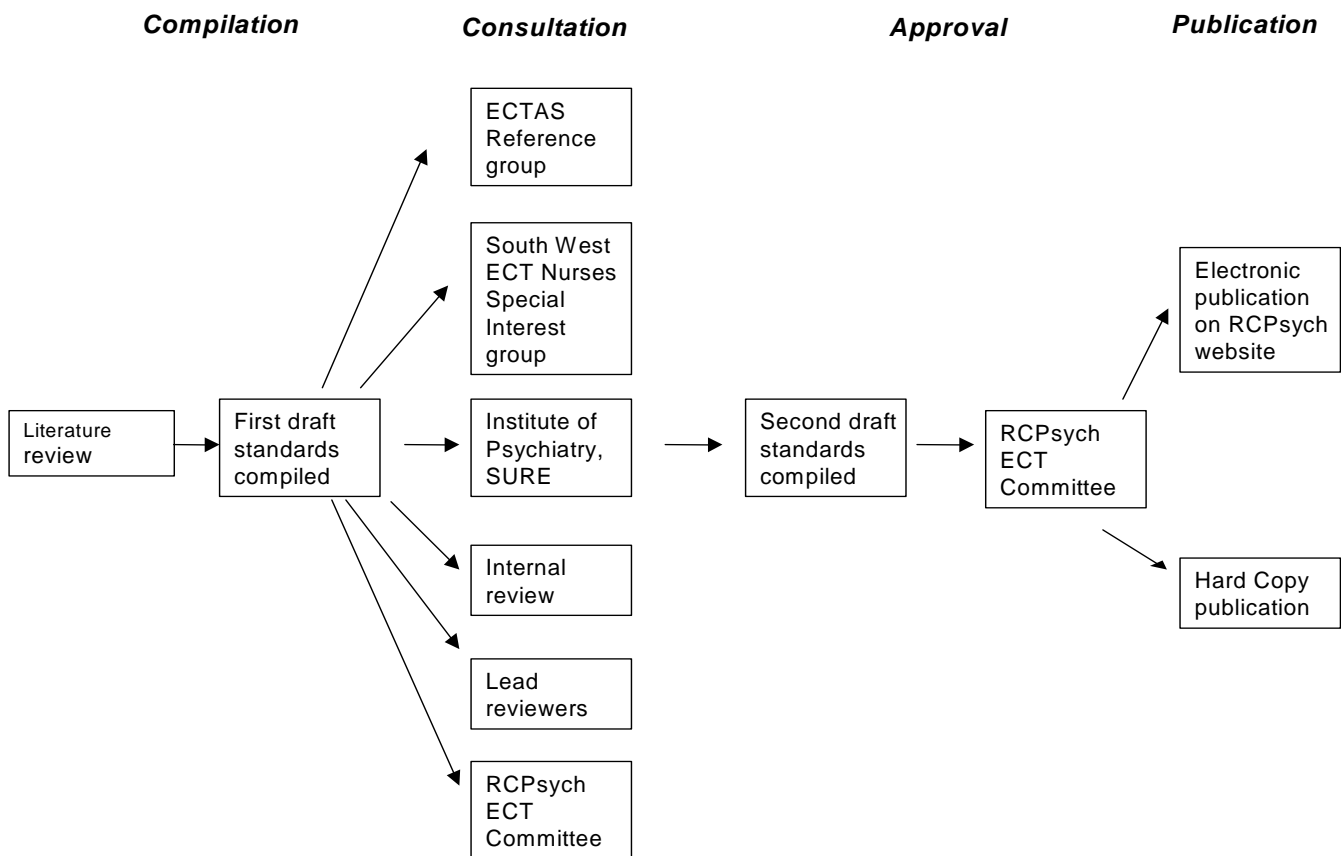
This is the third edition of the standards. These standards were comprehensively revised by the ECTAS Reference Group meeting of 2005, reordered and renumbered.

A copy of these standards will be sent to every clinic that becomes a member of ECTAS.

The standards are also available on our website at: www.rcpsych.ac.uk/cru

Method

Figure 1: Compilation to publication of the ECTAS standards



2nd Edition of the ECTAS Standards:

Revisions suggested by the email discussion group, lead reviewers and the ECTAS Accreditation Advisory Committee. These were discussed and ratified by the ECTAS Reference Group.

3rd edition of the ECTAS Standards:

Revisions suggested by the email discussion group, Service Users forum, lead reviewers and other ECT clinicians, and the ECTAS Accreditation Advisory Committee. These were discussed and ratified by the ECTAS Reference Group.

Acknowledgements

Consultation and support

We would like to thank the following for advice and support in producing this edition:

The ECTAS Reference Group:

Dr Maria Atkins
Mr Peter Bestley
Dr Andrew Blakey
Dr John Bowley
Ms Vanessa Cameron
Ms Alison Cobb
Mr Chris Curran
Mr Anthony Deery
Dr Andrew Easton
Ms Zoë Fortune
Dr Chris Freeman
Ms Lyn Garbarino
Ms Sonia Hashmi
Mrs Annie Higgs
Professor Paul Lelliott
Dr Rupert McShane
Dr Ray O'Toole
Dr James Ralph
Dr Noel Sheppard
Dr Heather Walker
Mr Adrian Worrall

The Service Users

ECTAS Member clinics

The National Association of Lead
Nurses in ECT

Number	Type	Standard
		Section 1: The ECT clinic and facilities
1.1	2	The ECT clinic consists of a minimum of three rooms, a waiting room, treatment room and recovery area
1.2	2	The clinic is clean, comfortable and provides a welcoming atmosphere
1.3	2	The clinic has access and facilities for disabled people
1.4	3	The clinic has an additional two rooms: an office for ECT staff and post-ECT waiting area
		Waiting Area
1.5	1	There is access to toilet facilities
1.6	1	It is large enough to accommodate the throughput of patients
1.7	2	Patients waiting for ECT should not be able to see into the treatment area while the treatment is taking place.
1.8	3	The area where patients wait is comfortable and quiet and has a range of distractions, for example, an outside window, pictures and magazines
		Treatment Room
1.9	1	The treatment room is of an adequate size for its purpose
1.10	1	It has easy access to a telephone
1.11	1	Up to date protocols for the management of cardiac arrest, anaphylaxis and malignant hypothermia are prominently displayed
1.12	1	If nitrous oxide is ever used, then the treatment room is equipped with scavenging equipment
1.13	2	It has a work surface and sink with hot and cold water
1.14	2	It has a clock with a second hand
1.15	2	It has a secure drug storage cupboard
1.16	2	It has a small fridge with a lock
1.17	2	Speech from the treatment room cannot be heard in the waiting area
1.18	2	Clinic staff in the treatment room are able to speak directly with staff in the recovery area, e.g. rooms are adjacent
1.19	3	There is good but not harsh illumination and ventilation is adequate

Number	Type	Standard
		Recovery Area
1.20	2	This area is large enough to accommodate the throughput of patients lying on trolleys with additional space to manoeuvre
1.21	2	It has a doorway large enough to admit a trolley from the treatment room
		Post-ECT Waiting Area
1.22	3	The post-ECT waiting area is well designed and has a suitable environment
1.23	3	It provides a friendly, relaxed environment
1.24	3	It has provision for refreshments for patients
		Office
1.25	3	Staff conversations and telephone calls cannot be overheard outside the office
1.26	3	It has a telephone
1.27	3	It has a computer provided
		Equipment
1.28	1	There is one tipping trolley or bed per patient which can comfortably accommodate a reclining adult, has braked wheels and can rapidly be tipped into a head down position
1.29	1	There is a fully equipped emergency trolley
1.30	1	There is an NIBP machine or sphygmomanometer and stethoscope and a means of measuring temperature
1.31	1	There is adequate resuscitation equipment (including a defibrillator)
1.32	1	Provision is made for positive pressure respiration: oxygen cylinder, mask and self-inflating bag and at least one full spare cylinder in both the treatment and recovery areas
1.33	1	There is at least one suction machine, preferably 1 in treatment room, 1 in recovery room. (If only one is available, treatment of a patient does not start until the previously treated patient is conscious, as assessed by the recovery practitioner or anaesthetist)
1.34	1	There is a pulse oximeter
1.35	1	There is a capnograph

Number	Type	Standard
1.36	1	There is an ECG monitor
1.37	1	Provision is made for assessing neuromuscular blockade, maintaining anaesthesia, ventilation and monitoring in the event that transfer to a Critical Care Area is needed
1.38	2	There is a means of measuring blood glucose concentration
1.39	2	There is moving and handling equipment, e.g. Sheet to help turn patient
1.40	3	There is a dedicated budget for ECT
		The following drugs are stocked in the clinic:
1.41	1	An anaesthetic induction agent: Thiopental, Propofol and alternatives
1.42	1	A muscle relaxant: suxamethonium and alternative
1.43	1	Oxygen
1.44	1	There is a standard tray of drugs for use in the event of cardiac arrest
1.45	1	The emergency tray contains drugs and equipment agreed with the local pharmacy or resuscitation committee
1.46	1	Dantrolene, plus sterile water. This should be stored within 5 minutes of the clinic and there is a protocol in the clinic for where it is stored if not stored in the ECT clinic
1.47	2	Others include: Atropine, Glycopyrrolate, Midazolam as agreed with ECT anaesthetist
1.48	2	A supply of drugs needed to treat other unwanted autonomic, cardiovascular, respiratory or neurological effects are available
		ECT Machine and equipment
1.49	1	The ECT machine is capable of providing stimuli according to current guidelines
1.50	1	Stimulus settings on the ECT machine may be altered easily and quickly
1.51	1	The ECT machine has a wide range of treatment settings
1.52	1	Two channel EEG monitoring facilities are available
1.53	1	The ECT nurse ensures that the machine function and maintenance is checked and recorded at least every year or according to machine guidance
1.54	2	An ECT nurse ensures that the clinic is properly prepared, organised and maintained

Number	Type	Standard
1.55	1	An ECT nurse ensures that the equipment in the clinic is well maintained
1.56	2	An ECT nurse is responsible for ordering and stocking drugs
1.57	2	An ECT nurse is responsible for ordering and stocking disposable equipment
1.58	3	There is a suitable back-up ECT machine/ arrangements are in place to obtain a machine from another clinic

Number	Type	Standard
		Section 2: Staff and Training
2.1	1	There are a minimum number of staff in the ECT clinic to safely meet the needs of the patients at all times.
2.2	1	There is at least one trained nurse in the treatment room
2.3	1	There is at least one trained nurse in the recovery area
2.4	1	There is at least one experienced anaesthetist present during treatment and recovery
2.5	1	There is an ODA/ ODP or suitably trained anaesthetic assistant present during treatment and recovery whose sole responsibility is to assist the anaesthetist during the procedure
2.6	1	There is at least one psychiatrist present during treatment and recovery
2.7	1	The number of staff in the recovery area exceeds the number of unconscious patients by one
2.8	1	All clinical staff present during a treatment session are trained in Basic Life Support
2.9	2	There is one person competent in cardiopulmonary resuscitation for every unconscious patient
2.10	2	There is one Life Support Provider trained to at least immediate level present during the treatment session
2.11	2	There are back-up staff easily available to assist in an emergency situation
2.12	2	For clinics that treat only one patient in a session, then the same nurse may attend both treatment and recovery
2.13	3	There is one Life Support Provider with competence at advanced level present during the treatment session
		Lead psychiatrist
2.14	1	There is a named consultant psychiatrist who leads ECT
2.15	1	The named consultant has dedicated sessional time for ECT and this should be included in a job plan, where such exists
		<i>He/ she has responsibility for:</i>
2.16	1	The development of treatment protocols
2.17	1	The training and supervision of clinical staff
2.18	1	Liaising with and advising other professionals
2.19	1	Audit and quality assurance

Number	Type	Standard
2.20	1	Continuing professional development
2.21	2	ECT is administered by a small cohort of experienced psychiatrists who regularly attend the ECT clinic
		Lead Nurse
2.22	1	There is a named ECT nurse who has dedicated sessional time
2.23	1	He/ She is of at least Band 6 (CNM2 Republic of Ireland)
2.24	2	He/ She has appropriate ECT and clinical experience
2.25	2	He/ She takes overall responsibility for the management of the clinic and care of the patient
		Lead Anaesthetist
2.26	1	Anaesthesia is administered by a consultant anaesthetist, or by trainees under the supervision of a consultant anaesthetist, who attends the clinic regularly
2.27	1	Royal College of Anaesthetists' guidelines on supervision of those working in remote sites is followed, including a clear pathway to gain advice from a readily contactable consultant.
2.28	1	Anaesthetists of one year's experience, assessed as competent for the task, may administer anaesthesia at base hospitals only.
2.29	2	There is a named consultant or lead clinician responsible for anaesthetic for ECT
2.30	2	There is a named consultant anaesthetist who has dedicated sessional time devoted to direct clinical care in the provision of anaesthesia for ECT.
		ECT Team
2.31	2	Unit staff work effectively as a multi-disciplinary team
2.32	3	There is a line management structure with clear lines of accountability within the clinic
2.33	3	There are regular multi-disciplinary team meetings for clinical matters, and policy and administration
2.34	3	The roles and responsibilities of unit staff are clearly defined, e.g. in up to date job descriptions, including the appropriate grade for the position
2.35	3	The same team work in the clinic every week for the purposes of continuity
2.36	3	This team take an active role in audit, academic teaching and development of evidence based best practice of ECT

Number	Type	Standard
		Training –
		All staff
2.37	1	All clinic staff have received appropriate training and education This includes training on:
2.38	1	Basic life support techniques
2.39	2	Policy and procedures
2.40	2	Legal frameworks, e.g.: the Mental Health Act Code of Practice
		Doctors
2.41	1	ECT is only administered by psychiatrists with formal training
		Administering doctors receive induction training covering the following areas:
2.42	1	An introduction to the theoretical basis of effective treatment with ECT
2.43	1	Familiarity with local ECT protocol and clinic layout
2.44	1	Observation of the administration of ECT prior to their first administration of ECT
2.45	2	Directly supervised by ECT consultant or appropriately trained deputy for at least 3 sessions prior to unsupervised administration
2.46	2	Supervision directly or through examination of treatment charts at least once a week whilst administering ECT
2.47	3	The opportunity to appraise papers on ECT
		Other staff
2.48	1	Other staff involved in the administration of ECT have appropriate induction and ongoing training
2.49	2	ECT nurses undergo an induction programme covering ECT policies and procedures, medical equipment safety and clinic management
2.50	2	ECT anaesthetists undergo a course of specific training from a consultant anaesthetist with an interest in ECT
2.51	2	ECT anaesthetists have read departmental guidelines on the administration of anaesthesia for ECT
2.52	2	ECT clinic staff attend appropriate training and conference events, e.g. The Royal College of Psychiatrists' ECT training course
2.53	2	Anaesthetists undergo training as recommended by current guidelines from the Royal College of Anaesthetists and Association of Anaesthetists

Number	Type	Standard
2.54	2	Appropriate methods are used to ensure staff training is effective
2.55	3	The training needs of ECT unit staff are formally assessed, e.g. via staff appraisals
2.56	3	There is a budget for training related to ECT
2.57	3	There is evidence that staff keep up to date with best practice and latest information

Number	Type	Standard
		Section 3: Assessment and preparation
		General
3.1	1	All prospective ECT patients receive a formal documented assessment
3.2	1	A detailed medical history is recorded
3.3	1	The anaesthetic risk is assessed, e.g. the ASA grade of the patient is identified and assessment made on the basis of this. This is recorded on the ECT form
3.4	1	Any variation in the ASA grade of the patient is recorded before the treatment session
3.5	1	A physical examination is recorded which includes the cardiovascular, respiratory and neurological systems
3.6	1	Current medication and drug allergies are recorded as well as any noted drug problems
3.7	2	The patients ethnicity is recorded
3.8	2	The patients Mental Health Act status is recorded
3.9	2	An assessment of the risk/benefit balance of having ECT is considered and recorded
3.10	2	A mental state examination is recorded
3.11	2	An assessment of memory is recorded
3.12	2	An assessment of orientation is recorded
3.13	2	A clear statement is included on why ECT has been prescribed
		Anaesthesia
3.14	1	There is a local policy, agreed with the anaesthetic department as to which investigations are needed before the first of a course of treatments. These include:
3.15	1	Serum urea and electrolytes are measured for patients on diuretics, lithium, or other vaso-active/ cardiac drugs, and those with diabetes or with known renal disease
3.16	2	A haemoglobin level for all patients. For those suffering from diabetes, blood sugar levels are assessed immediately before each treatment

Number	Type	Standard
3.17	2	Sickle-cell test for all Afro-Caribbean, Middle Eastern, Asian and Eastern Mediterranean patients, unless previously investigated/known
3.18	2	A chest x-ray when clinically indicated: e.g. chest infection, cardiomegaly
3.19	2	An ECG for all patients with cardiovascular, respiratory, renal disease, irregular pulse, heart murmur, hypertension, diabetics aged > 40, all males > 45 yrs, all females > 55 yrs.
3.20	2	HepB status for patients known to abuse intravenous drugs
3.21	2	LFTs for patients with cachexia, history of alcoholism, drug abuse or recent overdose
		The Clinic Session
3.22	1	The ECT nurse is responsible for ensuring that emergency resuscitation equipment is tested and checked before each ECT clinic session
3.23	1	The ECT nurse is responsible for ensuring that the emergency drugs tray is checked before each ECT clinic session for out of date drugs and missing items
3.24	1	The ECT nurse is responsible for ensuring that the ECT electrodes are checked visually before each ECT clinic session
3.25	1	If the machine does not self-check, an ECT nurse ensures that the output and electrical safety of the ECT machine is checked and recorded prior to each ECT session, including the testing of delivery dose
3.26	1	Patients are escorted to the waiting area and accompanied throughout each treatment session
3.27	1	The patient is escorted to the ECT clinic
3.28	1	Inpatients are escorted from the waiting room through ECT and recovery and back to the ward. The escort should be a registered nurse, ODA or doctor. (NB - <i>If the escort is delegated to an unqualified member of staff/ Care Assistant then it is the nurse who will be accountable for the consequences of that delegation</i>).
3.29	2	The escort is known to the patient, is aware of the patient's legal and consent status and has an understanding of ECT
3.30	2	The escort acts as an advocate, assessing concerns and feeding these back to the members of the team
3.31	2	The arrival of patients at the ECT clinic is managed to minimise waiting time
3.32	2	The ECT nurse plans the arrival times of patients by liaising with the wards, outpatient department and day hospitals
3.33	2	Waiting time is no longer than half an hour

Number	Type	Standard
3.34	2	Before ECT is administered, the patient is given any further information they may need and is introduced to the clinical team
3.35	2	The patient is introduced to all those who will be present during treatment
3.36	2	The psychiatrist explains what he/ she is going to do and why
3.37	2	The ECT nurse explains the procedure to the patient again, gives reassurance and spends time with relatives answering questions
3.38	2	The ECT nurse provides information about the safekeeping of valuables, location of toilets and arrangements for further appointments
3.39	2	The patient is asked if he/ she have all the information they need and whether they have any more questions or queries
3.40	3	The escort ensures that the patient's belongings and valuables are documented and properly stored
		The following documentation is available for clinic staff's reference:
3.41	1	The patient's consent form, Mental Health Act documentation and a copy of any other supporting documentation relating to consent
3.42	2	The patient's pre ECT assessment including medical examination, drug history and other investigations
		Before each treatment, the following checks are carried out and recorded:
3.43	1	The patient is asked when he or she last ate and last drank and this should concord with the length of time required for 'fasting' agreed with the local anaesthetic department
3.44	1	The patient's identity is checked and the patient wears an identity bracelet. (It is recognised that in exceptional circumstances an identity bracelet may not be worn e.g. risk of self harm)
3.45	2	All metal objects are removed from the patients hair and the patient is asked if he/ she is wearing any make up or nail polish, or whether he/ she has lacquer or cream in his/ her hair
3.46	2	The patient is asked to remove his/ her dentures
3.47	2	The patient's record is checked to confirm that he/ she is not allergic to anything effecting the treatment or anaesthetic. The patient also wears an allergy bracelet if appropriate
3.48	2	The ECT nurse ensures that the patient's blood pressure, pulse, temperature and weight are taken and recorded and the patient is encouraged to empty their bladder
3.49	2	The anaesthetist checks that there have been no problems with previous anaesthetics

Number	Type	Standard
		Section 4: Consent and information giving
4.1	1	Patients are provided with appropriate information to allow them to give consent This covers:
4.2	1	The nature of the treatment and a description of the process
4.3	1	The purpose and benefits of treatment, including likelihood of success
4.4	1	The risks and likelihood of adverse effects, including cognitive impairment
4.5	2	The likely consequences of not having ECT
4.6	2	Treatment alternatives and confirmation that these will be available if patient decides not to have ECT
4.7	2	The patients rights
		Information
4.8	1	A fact sheet is given to all patients, including patients unable to consent, that explains key information
4.9	1	The Mental Health Act Commission leaflet 3 is provided to all detained patients (England and Wales only) in addition to local ECT information
4.10	1	The patient is informed about how to obtain additional information and access to independent advocacy
4.11	2	Information is provided to patients verbally and in written formats
4.12	2	Day patients are advised and / or given specific guidelines relating to driving, drinking alcohol and being accompanied home after each treatment
4.13	2	Information when necessary, is available in languages other than English and in a format which people with sight, learning and other disabilities can use
4.14	2	If a person has difficulty communicating in English then information is provided through an interpreter and this is recorded in the patients notes
4.15	2	The doctor obtaining consent asks patients what additional information they might need
4.16	3	The fact sheet is clearly and simply written, explains key information, is up to date and was developed with service user consultation
4.17	3	Fact sheets with key information are on clear display and are readily available

Number	Type	Standard
4.18	1	The patient completes a consent form or there is an equivalent process if consent cannot be given
4.19	1	The consent form contains confirmation that the health professional has explained the procedure to the patient, in particular the intended benefits, serious/ frequent occurring risks and transient side-effects
4.20	1	For adults who are unable to consent to treatment, the relevant Mental Health Act documents (or photocopies) are attached to the consent form (England and Wales only)
4.21	1	Consent is obtained by a psychiatrist with adequate knowledge of the nature and effects of ECT and with respect to patient's rights
4.22	1	The referring consultant assesses the patient to determine whether he/ she can give valid consent
4.23	1	The patient's consent is never obtained through any form of coercion, e.g. implying the Mental Health Act will be applied if the patient refuses
4.24	1	In detained patients not able to give valid consent, a second opinion is obtained within the appropriate legislative framework
4.25	1	Where ECT is administered under the Mental Health Act, clinicians comply with the Code of Practice and the relevant documentation is completed
4.26	1	The doctor administering the treatment, the anaesthetist and the ECT nurse check the consent form or other relevant documentation before the first treatment
4.27	2	The doctor administering the treatment, the anaesthetist and the ECT nurse check the consent form or other relevant documentation before subsequent treatments
4.28	2	Consent form states whether the course is for bilateral or unilateral treatment
4.29	2	The consent form contains confirmation that the health professional has discussed with the patient what the procedure is likely to involve, the benefits and risks of any alternative available treatments (including no treatment) and any particular concerns of the patient
4.30	2	A statement from an interpreter when appropriate
4.31	2	A section specifying whether the patient continues to consent before each treatment
4.32	2	The clinic's consent policy and all consent forms used comply with Department of Health guidelines for design and use
4.33	2	A written record is kept of the assessment of competence and details of the process of consent
4.34	2	The decision to prescribe ECT is based on a documented assessment of the risks and potential benefits to the individual

Number	Type	Standard
4.35	2	Except in an emergency, the patient is given at least 24 hours to reflect on information about ECT and discuss with relatives, friends or advisers before making a decision regarding consent
4.36	2	The referring psychiatrist informs the patient that consent can be withdrawn at any time, and that fresh consent is then required before further treatment can be given
4.37	2	The patient is asked by the referring psychiatrist to give consent at the beginning of each course of ECT
4.38	2	A maximum number of treatment sessions in a course is stipulated
4.39	2	In situations where valid consent is difficult the individual's advocate and / or carer is consulted and advance directives are taken into account
4.40	2	The patient's relatives are informed about the treatment unless issues of patient confidentiality preclude this
4.41	2	The patient's original and on-going consent is checked before each treatment is administered
4.42	2	Clinic staff confirm that informal patients continue to give their valid consent before each treatment
4.43	2	For patients detained under the Mental Health Act and unable to consent to treatment, a certificate of second opinion, form 39 is available for inspection
4.44	2	For patients detained under the Mental Health Act who are able to consent to treatment, a form 38 is available for inspection
4.45	3	The consent form details what written information has been provided to the patient
4.46	3	The consent form details what procedures the treatment will involve, including anaesthesia

Number	Type	Standard
Section 5: Anaesthetic Practice		
5.1	1	'Recommendations for standards of monitoring during anaesthesia and recovery' Association of Anaesthetists of Great Britain and Ireland (2000) are followed
5.2	1	The anaesthetist checks the anaesthetic and suction equipment and prepares the anaesthetic agents
5.3	1	Oxygen is normally administered before ECT in order to produce optimum oxygen saturation
5.4	1	Anaesthesia is administered on a trolley or bed that can be swiftly tipped to a head down position
5.5	1	Before induction, the anaesthetist or assistant checks that any dentures have been removed or are secure
5.6	2	There are up to date guidelines relating to the induction of anaesthesia for ECT
5.7	2	The anaesthetist explains what he/ she is doing and why
5.8	2	The anaesthetist ensures that the patient is protected during the seizure
5.9	2	When the patient is induced, the anaesthetist or assistant inserts a bite block as appropriate
5.10	3	A short period of hyperventilation can be administered before stimulation if this is deemed appropriate

Number	Type	Standard
Section 6: The administration of ECT		
6.1	1	In routine cases, the administering doctor uses a constant-current (brief pulse) stimulus
6.2	2	The seizure duration is monitored by the direct observation of the resulting motor effects and two channel EEG monitoring
6.3	2	Except in an emergency, patients are given ECT two times a week at most
6.4	2	The clinical team assess the patient before each treatment with attention to possible adverse side effects and to see if further application is necessary
6.5	2	The administering doctor ensures that the stimulus dose and administration technique are optimal
6.6	2	The administering doctor ensures that an appropriate seizure is induced
6.7	2	There is adequate contact between the electrodes and the scalp of the patient
6.8	2	The seizure induced is a typical generalised tonic clonic convulsion
6.10	2	The clinical team reviews the dose on the basis of the patient's documented clinical response and adverse effects before each treatment
6.11	2	Adequate records are kept of treatment and incidents
6.12	2	There is a separate ECT record which includes: The anaesthetic induction agent dose; muscle relaxant dose; any ancillary medication; nature of ventilation; cardiorespiratory changes; seizure quality and duration; time to recover and postprocedural problems; current delivered; bilateral/ unilateral seizure; and immediate side effects
6.13	2	Adverse incidents and near misses are recorded, reported and investigated
6.14	3	The referring psychiatrist prescribes no more than two treatments at a time before reviewing and renewing the prescription

Number	Type	Standard
Section 7: Recovery, monitoring and follow-up		
7.1	1	The recovery practitioner is present as the patient recovers consciousness
7.2	1	Patients are adequately monitored and supported immediately after ECT
7.3	1	The recovery practitioner is competent in caring for the unconscious patient, and is fully conversant with aspiration/suction techniques, resuscitation procedures, including basic life support, and informs the anaesthetist of any cause for concern.
7.4	2	Pulse, blood pressure and pulse oximetry readings are documented by the recovery practitioner
7.5	2	As the patient recovers consciousness the recovery practitioner reassures gently and repeatedly and cares for the patient until they are fully orientated
7.6	2	The anaesthetist remains in the building and contactable until all patients recover full consciousness and are physiologically stable
7.7	2	The ECT nurse ensures that patients are not discharged until fully recovered
7.8	3	The psychiatrist remains in the building and contactable until all patients recover full consciousness and are physiologically stable
7.9	3	The patient is offered something to eat and drink before they are taken back to the ward
Monitoring		
7.10	2	Treatment outcome is adequately monitored and recorded between treatment sessions for in-patients receiving ECT
7.11	2	The patient's clinical status/ symptomatic response is assessed and recorded between each treatment session
7.12	2	The patient's orientation and memory is assessed before and after the first ECT, and re-assessed at intervals throughout the treatment course
7.13	2	The patient is interviewed to determine the extent of retrograde and anterograde amnesia and this is documented
7.14	2	Non-cognitive side effects are assessed and recorded between treatment sessions
7.15	2	The patient's subjective experience of treatment side effects and objective cognitive side effects are recorded between treatment sessions, for example, using a memory log
Follow up		
7.16	2	Treatment outcome is adequately monitored and recorded after course of ECT
7.17	2	Appropriate actions are taken to ensure that benefits from ECT are maintained

Number	Type	Standard
7.18	3	The patient's clinical status/ symptomatic response is recorded 3 and 6 months after treatment
7.19	3	The patient's memory and cognitive functioning is recorded 3 and 6 months after a treatment course is finished
7.20	3	The patient's subjective experience of treatment side effects and objective cognitive side effects are recorded 3 and 6 months after a treatment course has finished, for example, using a memory log

Number	Type	Standard
Section 8: Special Precautions (also see PROTOCOLS)		
8.1	1	High risk patients are considered for treatment in an environment allowing rapid intervention should complications occur, for example, a theatre suite or its recovery area
8.2	1	The ECT machine used is able to give flexible doses, including very low stimuli
8.3	2	Wherever practical, ECT is administered to patients in a clinic close to a base hospital with identifiable critical care provision
8.4	2	For bilateral ECT, the initial stimulus given to adolescents and children is at the bottom end of the range
8.5	2	ECT sessions for people under 18 are held separately from sessions involving adults
8.6	3	Special arrangements are made when patients are given ECT in a clinic remote from a base hospital, e.g. patients have an individual trained nurse escort and commuting patients are treated at the beginning of the session to allow maximum time for recovery
Day patients		
8.7	1	Discharge criteria which includes assessment before discharge are agreed with the local anaesthetic department
8.8	1	Day patients and / or their carers sign a form which confirms: They will not drive for at least the next 24 hours or a longer period as advised by the anaesthetist concerned, They will not drink alcohol during this period, They will be accompanied home, They will have appropriate supervision by a responsible adult for the night after each ECT treatment (or for 24 hours following treatment)

Number	Type	Section 9 - PROTOCOLS
9.1	1	There is a protocol for how and where Dantrolene is stored
9.2	1	There is a protocol for the management of cardiac arrest
9.3	1	There is a protocol for the management of anaphylaxis
9.4	1	There is a protocol for the management of malignant hyperthermia
9.5	1	There is a protocol that addresses the needs of day patients including preparation for leaving hospital
9.6	1	There is a protocol addressing what information staff should give to day patients before they are discharged
9.7	2	There is a protocol on maintenance/continuation ECT
9.8	2	There is a protocol on the choice of laterality of treatment.
9.9	2	There is a protocol relating to preparing patients for ECT
9.10	2	There is a protocol relating to who may obtain consent in the clinical team who refer to the clinic
9.11	2	The clinic has a protocol or checklist for monitoring patients immediately after ECT
9.12	2	There is an up to date protocol relating to the patients' medication during and after treatment
9.13	2	The clinic has a protocol relating to the treatment of elderly people. This includes reference to cognitive side effects, seizure threshold and choice of anaesthetic induction agent
9.14	2	The clinic has a protocol relating to the treatment of young people under 18. This includes reference to cognitive side effects, and seizure thresholds
9.15	2	There is a protocol about when to discontinue treatment when no clinical response is seen
9.16	2	There is a local protocol about the quality and timing of an adequate seizure
9.17	2	There is a protocol about the management of a prolonged or tardive seizure
9.18	2	There is a local protocol about when to restimulate a patient after a brief or missing seizure
9.19	2	There is a stimulus dosing protocol
9.20	2	There is a protocol on the use of EEG monitoring

ECTAS Bibliography

Clinical Negligence Scheme for Trusts, Clinical Risk Management Standards. CNST, 2002

CRAG Working Group on Mental Illness. Electroconvulsive Therapy, A Good Practice Statement. CRAG, 1997.

CRAG Working Group on Mental Illness. National Audit of Electroconvulsive Therapy (ECT) in Scotland. CRAG, 2000.

Duffett, R & Lelliott, P. Auditing Electroconvulsive Therapy. The third cycle. *British Journal of Psychiatry*, 1998; 172: 401-405

Department of Health and Welsh Office. Mental Health Act 1983 Code of Practice. London: Department of Health; 1999

National Institute for Clinical Excellence. Guidelines on the use of Electroconvulsive Therapy. London: NICE, 2003.

Worrall, A, O'Herlihy, A & Palmer, L. Quality Network In-patient CAMHS Service Standards. London: Royal College of Psychiatrists' Research Unit; 2003

Rose D, Fleischmann P, Wykes T, Bindman J. Patients' perspectives on Electroconvulsive therapy: systematic review. *BMJ* 2003; 326: 1363-5.

Royal College of Psychiatrists' Special Committee on ECT. The ECT Handbook. London: Royal College of Psychiatrists, 1995

Scott, Allan (ed). The ECT Handbook. London: Royal College of Psychiatrists, 2005

The UK ECT Review Group. Electroconvulsive therapy: systematic review and meta-analysis of efficacy and safety in depressive disorders. *Lancet* 2003; 361: 799-808

UK Government. Health and Safety Act. London: UK Government; 1974

ECTAS Standards Feedback Form

We hope that you have found the ECTAS standards useful and would very much appreciate your feedback. Your comments will be incorporated, with the approval of the ECTAS members, into future editions of this publication.

1. Have you found these standards useful? Yes No

Comments:

2. Do you have suggestions for new sections or topic areas you would like to see included in future versions?

3. Do you have suggestions for new standards or criteria you would like to see included in future versions?

4. Do you have any general suggestions about this document that would improve its usefulness?

5. What is your profession?

Thank you for taking the time to complete this form. Your comments will be considered carefully. Please photocopy and return to: ECTAS, Royal College of Psychiatrists' Research Unit, 4th Floor, Standon House, 21 Mansell Street, London, E1 8AA. Fax: 020 7481 4831

Contact Details

The Project Team

Adrian Worrall
Programme Manager
020 7977 6690
aworrall@cru.rcpsych.ac.uk

Joanne Cresswell
ECTAS Project Manager
020 7977 6694
jcresswell@cru.rcpsych.ac.uk

Lauren Rayner
ECTAS Project Worker
020 7977 6696
lrayner@cru.rcpsych.ac.uk

Chloë Hood
ECTAS Project Worker (Temporary)
ChloëH@cru.rcpsych.ac.uk

Zoë Fortune
ECTAS Research Worker (Honorary)
ECTAS@cru.rcpsych.ac.uk

The Royal College of Psychiatrists' Research Unit
4th Floor
Standon House
21 Mansell Street
London
E1 8AA

<http://www.rcpsych.ac.uk/cru/ECTAS.html>