Consistency of Triage in Victoria's

Emergency Departments

Guidelines for Triage Education and Practice

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Foreword

The Consistency of Triage in Victoria's Emergency Departments Project was funded by the Victorian Department of Human Services and conducted by the Monash Institute of Health Services Research during 2000-2001.

The project was overseen by a steering committee with representation from the Department of Human Services, the Australasian College for Emergency Medicine, the Emergency Nurses Association, the Australian Nursing Federation and Victorian hospitals and universities. The members of the steering committee were:

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The report detailing the project has been presented in five separate documents being:

The Literature Review;

The Triage Consistency Report;

The Education and Quality Report;

The Guidelines for Triage Education and Practice; and

The Summary Report.

This education package is the fourth in the series and is designed for training nurses in the role of triage and ensuring consistency of triage both within and across hospitals.

Further information regarding this project can be obtained from:

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Contents

Index of Tables

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Terminology

ACEM	Australasian College for Emergency Medicine
APD	Adult Physiological Discriminators
AMI	Acute myocardial infarction
ATS	Australasian Triage Scale (formerly the National Triage Scale)
BLS	Basic life support
BP	Blood pressure
COAD	Chronic obstructive airways disease
CT	Computer tomography
CVA	Cerebrovascular accident
DHS	Department of Human Services (Victoria)
ECG	Electrocardiograph
ED	Emergency department
ENA	Emergency Nurses' Association of Victoria (Incorporated)
GCS	Glasgow Coma Scale
HR	Heart rate
Hx	History
NIDDM	Non-insulin dependent diabetes
NTS	National Triage Scale for Australasian Emergency Departments
PPD	Paediatric Physiological Discriminators
PHx	Past history
POP	Plaster of Paris
RICE	Rest, ice, compression, elevation
RR	Respiratory rate
SaO_2	Oxygen saturation
SBP	Systolic blood pressure
SOB	Shortness of breath
Triage Category	One of the five ATS categories
Tx	Treatment
Vital Signs	Respiratory rate, heart rate and blood pressure, may or may not include temperature

1 Introduction

The guidelines and physiological discriminators (see Appendices 2a & 2b) presented in this document are a part of the Consistency of Triage in Victoria's Emergency Departments Project (2001), funded by the Victorian Department of Human Services. The development of these guidelines are, with permission, based on the Position Statements: Triage and Educational Preparation of Triage Nurses written by the Emergency Nurses' Association of Victoria (Inc.) (ENA) Triage Working Party (see Appendices 3 & 4). The guidelines and physiological discriminators were developed in consultation with ENA and clinical nurse educators, lecturers, nurse unit managers and clinicians from a wide variety of Emergency Departments (EDs) across Victoria.

The Emergency Nurses' Association of Victoria (Inc.) has recommended that all triage nurses undertake educational preparation prior to undertaking the triage role[1]. These guidelines are written with the assumption that triage nurses meet the criteria as documented in ENA Position Statement: Triage[2].

1.1 Guide for use

The guidelines are intended to provide minimum standards for triage education and practice. They are to be used as guidelines only and are in no way intended to replace the clinical judgement of triage nurses. The aim of these guidelines is to provide a consistent approach to triage education in Victoria and therefore promote consistency of triage practice, including application of the Australasian Triage Scale (ATS). It is the intention that these guidelines be used for unit based triage education and they should be seen as an adjunct to triage education at postgraduate level.

How these guidelines are used will be dependent on the resources and organisational structure of the ED in which you are working. They may compliment material that is already available in the ED or be the main reference material for triage education. It is suggested that these guidelines are supported by other education strategies such as inservice education, supernumerary triage practice and discussion of the Guideline objectives and triage scenarios with the person responsible for triage education in your ED. The broader use of these guidelines may include the development of competencies, self test questions, take home exams or formal assessment of triage category allocation. This again, will be dependent on the ED in which you work.

The Consistency of Triage in Victoria's Emergency Departments Project also undertook the development of an audit tool that can be used to evaluate the effectiveness of the education package and the consistency of triage within each ED. It is the intention that these guidelines are used in conjunction with the triage audit tool. Further details regarding the triage audit tool and its use is contained in Report 3 – Education and Quality Report.

1.2 Contents

The guidelines developed and presented throughout this document provide an overview of triage, the ATS, triage decisions including data collection and communication skills, documentation and risk management. The ENA position statements have been provided as supportive information in the appendices and Report 1 – Literature Review may be used as additional reading, if desired.

Once having read the content and / or undertaken unit based triage education, the triage nurse can test his or her learning by completing the scenarios provided in Appendix 4. The answers are provided in Appendix 5.

2 Objectives

These objectives directly reflect those objectives cited by the ENA Position Statement: Educational Preparation of Triage Nurses[1]. Following reading of these guidelines, completion of the practice scenarios and a period of supervised triage practice, the triage nurse should be able to:

i. Define the role of the triage nurse;

ii. Demonstrate an understanding of the principles of triage;

iii. Demonstrate an understanding of the Australasian Triage Scale (ATS) (formerly the National Triage Scale);

iv. Perform an accurate triage assessment and allocate a triage category based on that assessment;

v. Demonstrate an ability to prioritise patients on the basis of clinical presentation and allocate presenting patients to an appropriate area of the ED;

vi. Initiate appropriate nursing interventions;

vii. Demonstrate an understanding of institutional and community resources;

viii. Identify avoidable hazards that may threaten another's well being; and

ix. Utilise the problem solving approach when dealing with emergency situations.

3 Principles of triage

The term "triage" originates from the French word "trier" which means to sort, pick out, classify or choose[3]. The triage principle of prioritising care to large groups of people has been adapted from its military origin for use in the civilian context of initial emergency department care [3-5].

Triage is the formal process of immediate assessment of all patients who present to the ED[3,6-8]. It is an essential function in the ED as many patients may present simultaneously[9]. An effective triage system aims to ensure that patients seeking emergency care "receive appropriate attention, in a suitable location, with the requisite degree of urgency" and that emergency care is initiated in response to clinical need rather than order of arrival[9-11]. Triage aims to promote the safety of patients by ensuring that timing of care and resource allocation is requisite to the degree of illness or injury[6,12]. An effective triage system classifies patients into groups according to acuity of illness or injury and aims to ensure that the patients with life threatening illness or injury receive immediate intervention and greatest resource allocation[1,2,6,10,13].

In Australia, triage is predominantly a nursing assessment that begins when the patient presents to the Emergency Department. Triage is the point at which emergency care begins[11]. Triage is an ongoing process involving continuous assessment and reassessment[1].

4 Australasian Triage Scale

The National Triage Scale (NTS) is a five category triage scale derived from the Ipswich and Box Hill Triage Scales. The NTS was formulated in 1993 by the Australasian College for Emergency Medicine (ACEM) with the aim to "…standardise the nomenclature and descriptors of … triage categories for use in Emergency Departments in Australia…"[12,14].

The five triage categories used in the NTS are displayed in Table 4.1.

Table 4.1. National Triage Scale categories

Numeric Code	Category	Treatment Acuity	Colour Code
1	Resuscitation	Immediate	Red
2	Emergency	Minutes (< 10 mins)	Orange
3	Urgent	Half hour	Green
4	Semi-urgent	One hour	Blue
5	Non-urgent	Two hours	White

The Australasian Triage Scale (ATS) was formulated in 2000 by ACEM and is a result of revision of the NTS[9]. The five triage categories used in the ATS are displayed in Table 4.2.

Table 4.2. Australasian Triage Scale categories

ATS Category	Description of Category	Response
1	Immediately life-threatening	Immediate
2	Imminently life-threatening or important time-critical treatment or very severe pain	Assessment and treatment within 10 minutes
3	Potentially life-threatening or situational urgency or human practice mandates the relief of severe discomfort or distress within 30 minutes	Assessment and treatment start within 30 minutes
4	Potentially life-serious or situational urgency or significant complexity or severity or human practice mandates the relief of severe discomfort or distress within 60 minutes	Assessment and treatment start within 60 minutes
5	Less urgent or clinico-administrative problems	Assessment and treatment start within 120 minutes

The ATS directly relates triage category with various patient outcome measures (inpatient length of stay, ICU admission, mortality rate) and resource consumption (staff time, cost)[15].

5 Triage decisions

Triage decisions are complex clinical decisions often made under conditions of uncertainty with limited or obscure information, minimal time and with little margin for error[16,17]. Triage nurses must also be able to discriminate useful cues from large amounts of information in order to perform triage safely[16,18]. It is the responsibility of the triage nurse to rapidly identify and respond to actual life-threatening states and to also make a judgement as to the potential for life-threatening states to occur[18].

Triage decisions are made in response to the patient's presenting signs or symptoms and no attempt to formulate a medical diagnosis is made[11]. The allocation of a triage category is made on the basis of necessity for time-critical intervention to improve patient outcome, potential threat to life or need to relieve suffering[11]. The decisions made by a triage nurse are a pivotal factor in the initiation of emergency care. Therefore the accuracy of triage decisions is a major influence on the health outcomes of patients[3,16,19]. As all of these characteristics make triage decision-making inherently difficult, it may be argued that triage nurses require advanced clinical decision making expertise[20].

Triage decisions can be divided into primary and secondary triage decisions. Primary triage decisions relate to the triage assessment, allocation of a triage category and patient deposition whilst secondary triage decisions relate to the initiation of nursing interventions in order to expedite emergency care and promote patient comfort[19,21].

6 Primary triage decisions

The allocation of a triage category is based on the nature of the patient's presenting problem and the need for *medical intervention* as determined by the triage nurse[12,14]. The time to treatment described for each triage category refers to the maximum time the patient should wait for *medical* assessment and treatment[9,15].

Triage decisions and triage category allocation should be based on the patient's individual need for care and should not be affected by ED workloads, performance criteria, financial incentives or organisational systems[6,9]. All patients should be allocated a triage category according to their objective clinical urgency. The presence of specific organisational systems, for example, nurse initiated interventions, team responses and fast track systems should not affect triage category allocation[9].

There are three well-recognised outcomes of primary triage decisions. These are "expected" triage decisions, "over triage" decisions and "under triage" decisions[22-25].

> An "expected" triage decision is the allocation of a triage category that is appropriate to the patient's presenting problem. The patient will be seen by a doctor within a suitable time frame and should have a positive health outcome[22-25].
>
> An "over triage" decision is the allocation of a triage category of a higher acuity than indicated by the patient's physiological status and risk factors. This results in the patient's waiting time until medical intervention being shorter. Although this is not detrimental to the patient in question, the effect of inappropriate allocation of resources has the potential to adversely affect other patients in the ED [22-25].
>
> An "under triage" decision is the allocation of a triage category of a lower acuity than indicated by the patient's physiological status and risk factors. This prolongs the patient's waiting time until medical intervention and there is potential for patients to deteriorate whilst waiting or be subjected to prolonged pain or suffering. These factors increase the risk of an adverse patient outcome [22-25].

Primary triage decisions should be based on both objective and subjective data as follows:

Objective data:

- Primary survey; and
- Physiological data.

Subjective data:

- Chief complaint;
- Precipitating event / onset of symptoms;
- Mechanism of injury;
- Time of onset of symptoms / event; and
- Relevant past history[1]

7 Objective data collection

7.1 Primary survey

The primary survey should form the basis of all primary triage decisions. If a breach of the primary survey is detected, the triage assessment should be terminated and the triage nurse initiate immediate interventions. For example, basic life support in the event of respiratory / cardiac arrest or the application of pressure in the event of haemorrhage[1]. Order of triage should not be restricted to order of arrival but should be based on "across the room" assessment of patients waiting to be triaged[1].

7.2 Physiological data

"Airway, breathing, and circulation are the prerequisites of life and … their dysfunction are the common denominators of death"

McQuillan et al. 1998 p316[26].

Research supports the use of physiological criteria as a basis for clinical decisions. Many studies report that the majority of patients exhibit physiological abnormalities in the hours preceding cardiac arrest and that patient outcomes can be related to physiological criteria[27-35]. Research has also demonstrated that triage nurses frequently use indicators of patient safety (normal clinical characteristics) when making triage decisions[11].

The primary triage decision should reflect the physiological status of the patient and the collection of physiological data for all patients should follow the primary survey approach[11]. The physiological discriminators developed from the literature, work previously undertaken by the ENA Working Party and consensus with Victorian triage nurses who attended the project's forums will be used to discuss, in detail, how physiological data relates to each of the triage categories. For convenience, these physiological discriminators (*adult & paediatric*) can also be found in appendices 2a & 2b at the end of the text.

The aim of the physiological discriminators is not to replace the clinical judgement of the triage nurse but to provide a consistent, research-based approach to triage education. For the ease of description, the physiological discriminators in these guidelines are arbitrarily divided into cells relating to each element of the primary survey with a triage category. It should be remembered that these divisions are artificial. As with elements of patient assessment, each discriminator should be considered as part of a larger clinical picture and not considered in isolation.

The physiological discriminators described in these guidelines are not intended to be used in a stepwise fashion to make triage decisions. It is intended that they provide novice triage nurses with a tool against which to reflect on their primary triage decisions. For example, a novice triage nurse carries out his or her triage assessment and allocates a triage category. He or she may then refer to the physiological discriminators to critique that decision. These discriminators may also assist novice triage nurses in justifying their triage decision to others.

7.2.1 Airway

Table 7.1 displays the physiological discriminators for airway, both adult and paediatric, for each triage category. Any adult patient with an obstructed or partially obstructed airway should be allocated Category 1. These patients have failed their primary survey and require definitive airway management. In adults, stridor is evident when greater than 75% of the airway lumen has been obstructed, however in children stridor can occur as a consequence of minimal oedema, swelling or obstruction[36,37].

Table 7.1. Physiological discriminators for airway

Triage Category	Adult	Paediatric
Category 1	♦ Obstructed	♦ Obstructed
	♦ Partially obstructed airway	♦ Partially obstructed airway with severe respiratory distress
Category 2	♦ Patent airway	♦ Patent
		♦ Partially obstructed airway with moderate respiratory distress
Category 3	♦ Patent airway	♦ Patent
		♦ Partially obstructed airway with mild respiratory distress
Category 4	♦ Patent airway	♦ Patent airway
Category 5	♦ Patent airway	♦ Patent airway

7.2.2 Breathing

Table 7.2 displays the physiological discriminators for breathing, both adult and paediatric, for each triage category. Observation of respiratory function is reported to be an influential factor in many triage decisions[11]. The characteristic of "normal respiration" has been reported as influential in as many as 62% of triage episodes and "respiratory distress" was found by one study to be the most frequently reported abnormality of respiration[11].

Table 7.2. Physiological discriminators for breathing

Triage Category	Adult	Paediatric
Category 1	♦ Absent respiration or hypoventilation	♦ Absent respiration or hypoventilation
	♦ Severe respiratory distress, e.g.	♦ Severe respiratory distress, e.g.
	- severe use accessory muscles	- severe use accessory muscles
	- unable to speak	- severe retraction
	- central cyanosis	- acute cyanosis
	- altered conscious state	
Category 2	♦ Moderate respiratory distress, e.g.	♦ Moderate respiratory distress, e.g.
	- moderate use accessory muscles	- moderate use accessory muscles
	- speaking in words	- moderate retraction
	- skin pale / peripheral cyanosis	- skin pale
Category 3	♦ Mild respiratory distress, e.g.	♦ Mild respiratory distress, e.g.
	- mild use accessory muscles	- mild use accessory muscles
	- speaking in sentences	- mild retraction
	- skin pink	- skin pink
Category 4	♦ No respiratory distress, e.g.	♦ No respiratory distress, e.g.
	- no use accessory muscles	- no use accessory muscles
	- speaking in full sentences	- no retraction
Category 5	♦ No respiratory distress, e.g.	♦ No respiratory distress, e.g.
	- no use accessory muscles	- no use accessory muscles
	- speaking in full sentences	- no retraction

Respiratory dysfunction is known to be a clinical antecedent to adverse events[31,38-40]. New onset dyspnoea and tachypnoea are well documented to be significant indicators of impending adverse events[29]. Admission to hospital with pulmonary problems has been demonstrated to have a higher than average incidence of mortality and morbidity and inadequate oxygenation has been identified as one of the recurrent factors in preventable deaths[33,41,42].

Given that respiratory dysfunction is a predictor of poor outcome, it is important that respiratory dysfunction is identified during the triage assessment. Finite values for respiratory rate have not been stated in the physiological discriminators as there is some variation in the literature and most of this literature pertains to adult patients. However, most of the respiratory rates cited do have similarities:

RR > 30 breaths per minute [32,40];

RR < 10 or > 25 breaths per minute [35];

RR < 5 or > 36 breaths per minute [30];

RR < 10 or > 30 breaths per minute [29];

RR > 30 breaths per minute [27].

7.2.3 Circulation

Table 7.3 displays the physiological discriminators for circulation, both adult and paediatric, for each triage category. Haemodynamic compromise, particularly hypotension has been documented as an indicator of poor outcome[43,44]. Therefore it is important that haemodynamic compromise if present is detected during the triage assessment. As it may or may not be possible to measure blood pressure at triage, other indicators of haemodynamic status should be considered, for example:

Peripheral pulses;

Skin status;

Conscious state;

Alterations in heart rate.

Table 7.3. Physiological discriminators for circulation

Triage Category	Adult	Paediatric
Category 1	♦ Absent circulation	♦ Absent circulation
		♦ Significant bradycardia e.g. HR < 60 in infants
	♦ Severe haemodynamic compromise, e.g. - absent peripheral pulses - skin pale, cold, moist - significant alteration in HR - altered conscious state	♦ Severe haemodynamic compromise, e.g. - absent peripheral pulses - skin pale, cold, moist, mottled - significant tachycardia - capillary refill > 4 secs
	♦ Uncontrolled haemorrhage	♦ Uncontrolled haemorrhage
Category 2	♦ Moderate haemodynamic compromise, e.g. - absent radial pulse but palpable brachial pulse - skin pale, cool, moist - moderate alteration in HR	♦ Moderate haemodynamic compromise, e.g. - weak / thready brachial pulse - skin pale, cool - moderate tachycardia - capillary refill 2-4 secs
		♦ > 6 signs of dehydration
Category 3	♦ Mild haemodynamic compromise, e.g. - palpable peripheral pulses - skin pale, cool, dry - mild alteration in HR	♦ Mild haemodynamic compromise, e.g. - palpable peripheral pulses - skin pale, warm - mild tachycardia
		♦ 3 - 6 signs of dehydration
Category 4	♦ No haemodynamic compromise, e.g. - palpable peripheral pulses - skin pink, warm, dry	♦ No haemodynamic compromise, e.g. - palpable peripheral pulses - skin pink, warm, dry
		♦ < 3 signs of dehydration
Category 5	♦ No haemodynamic compromise, e.g. - palpable peripheral pulses - skin pink, warm, dry	♦ No haemodynamic compromise, e.g. ♦ No signs of dehydration

Again finite values for heart rate and blood pressure have not been stated in the physiological discriminators due to variation in the literature. Again most of the values for heart rate and blood pressure do share similarities:

HR < 70 or > 110 beats per minute[35];

HR < 40 or > 140 beats per minute[30];

HR < 45 or > 125 beats per minute[29];

HR < 50 or > 130 beats per minute[27].

SBP < 90 mmHg[32,38];

SBP < 70 mmHg or > 110 mmHg[35];

mean BP < 70 mmHg or > 130 mmHg[29];

SBP < 90 mmHg or > 200 mmHg[27].

7.2.3.1 Paediatric dehydration

One of the most common paediatric presentations related to haemodynamic status is dehydration and this may be the result of a wide range of illnesses. There are many signs and symptoms of dehydration, however the information provided by these signs and symptoms is of more value if considered collectively rather than in isolation. Examples of signs and symptoms of dehydration that have been tested by research are:

Decreased level of consciousness;

Capillary refill < 2 seconds;

Dry oral mucosa;

Sunken eyes;

Decreased tissue turgor;

Absent tears;

Deep respirations;

Thready / weak pulse;

Tachycardia;

Decreased urine output[45].

Research has found that the presence of any three or more signs had a sensitivity of 87% and specificity of 82% for detecting a deficit of 5% or more and the presence of any two or more of these signs indicating a deficit of at least 5%[45].

7.2.4 Disability - conscious state

Table 7.4 displays the physiological discriminators for disability – conscious state, both adult and paediatric, for each triage category. Alteration in conscious state (confusional states, agitation, restlessness, lethargy) has been documented to be a clinical indicator of poor outcome and adverse event[28,31,40,44]. Neurological observations are also reported to be influential in up to 25% of triage episodes and level of activity was one of the most common factors cited by triage nurses as influential in paediatric triage[11].

Table 7.4. Physiological discriminators for disability

Triage Category	Adult	Paediatric
Category 1	♦ GCS < 8	♦ GCS < 8
Category 2	♦ GCS 9 - 12	♦ GCS 9 - 12
		♦ Severe decrease in activity, e.g.
		- no eye contact
		- decreased muscle tone
Category 3	♦ GCS ≥ 13	♦ GCS ≥ 13
		♦ Moderate decrease in activity, e.g.
		- lethargic
		- eye contact when disturbed
Category 4	♦ Normal GCS	♦ Normal GCS
	- or no acute change to usual GCS	- or no acute change to usual GCS
		♦ Mild decrease in activity, e.g.
		- quiet but eye contact
		- interacts with parents
Category 5	♦ Normal GCS	♦ Normal GCS
	- or no acute change to usual GCS	- or no acute change to usual GCS
		♦ No alteration to activity, e.g.
		- playing
		- smiling

The Glasgow Coma Scale (GCS) was developed as a standardised scoring system for the neurological assessment of patients with head injury[46]. A GCS of less than 9 is considered a severe head injury, GCS of 9 to 13 is considered moderate and GCS of 14 to 15 is considered a mild head injury[46]. Severe head injury (GCS < 9) accounts for approximately 10% of patients with head injury and carries a mortality rate of up to 40%, with most deaths occurring in the first 48 hours. Moderate head injury (GCS 9 – 13) accounts for approximately 10% of patients with head injuries and whilst mortality is estimated to be less than 20%, long term disability may be as high as 50%. Approximately 70 –80% of patients with head injuries fall into the mild classification (GCS >13). Of this group of patients, it is estimated that 38% of patients will have findings on CT and 8% will require neurosurgical intervention[46].

Although the Glasgow Coma Scale has never been validated for use in children, there are modified versions of the GCS with age specific considerations. The Glasgow Coma Scale and its age specific modifications are displayed in Table 7.5[47,48].

Table 7.5. Glasgow Coma Scale with age specific considerations

Category/Score	Adult	Child	Infant
Eye Opening			
4	Spontaneous	Spontaneous	Spontaneous
3	To speech	To speech	To speech
2	To pain	To pain	To pain
1	No response	No response	No response
Verbal Response			
5	Orientated	Orientated	Coos and babbles
4	Confused conversation	Confused	Irritable cry
3	Inappropriate words	Inappropriate words	Cries to pain
2	Incomprehensible sounds	Incomprehensible sounds	Moans to pain
1	No response	No response	No response
Motor Response			
6	Obeys commands	Obeys commands	Normal, spontaneous movement
5	Localises to pain	Localises to pain	Withdraws to touch
4	Withdrawal to pain	Withdrawal to pain	Withdrawal to pain
3	Flexion to pain	Flexion to pain	Flexion to pain
2	Extension to pain	Extension to pain	Extension to pain
1	No response	No response	No response

7.2.5 Disability - pain

Table 7.6 displays the physiological discriminators for disability - pain, both adult and paediatric, for each triage category. Severity of a patient's pain was identified by one study as an influential factor in 63% of triage episodes[11].

Table 7.6. Physiological discriminators for disability - pain

Triage Category	Adult	Paediatric
Category 1		
Category 2	♦ Severe pain, eg. - patient reports severe pain - skin pale, cool - severe alteration in vital signs - requests analgesia	♦ Severe pain, eg. - patient reports severe pain - skin pale, cool - severe alteration in vital signs - requests analgesia
Category 3	♦ Moderate pain, eg. - patient reports moderate pain - skin pale, warm - moderate alteration in vital signs - requests analgesia	♦ Moderate pain, eg. - patient reports moderate pain - skin pale, warm - moderate alteration in vital signs - requests analgesia
Category 4	♦ Mild pain, eg. - patient reports mild pain - skin pale / pink, warm - mild alteration in vital signs - requests analgesia	♦ Mild pain, eg. - patient reports mild pain - skin pale / pink, warm - mild alteration in vital signs - requests analgesia
Category 5	♦ Mild pain, eg. - patient reports mild pain - skin pale / pink, warm - no alteration in vital signs - declines analgesia	♦ Mild pain, eg. - patient reports mild pain - skin pale / pink, warm - no alteration in vital signs - declines analgesia

Assessment of pain at triage should take into account both subjective and objective data. Pain is a subjective experience and patients should not have to justify their pain to health care providers. If the patient says their pain is 10 out of 10 then the onus is on the triage nurse to believe the patient. The purpose of the triage assessment is to ascertain how long that patient can wait with that degree of pain, not to ascertain whether or not the patient's pain is in fact 10 out of 10. It is also part of the triage role to initiate simple interventions that will relieve pain such as application of an ice pack, or splinting or elevation of a limb. It is beyond the scope of these guidelines to provide detailed education regarding assessment and management of pain - this should be sought from more appropriate sources.

7.2.6 Disability - neurovascular status

Table 7.7 displays the physiological discriminators for disability – neurovascular status, both adult and paediatric, for each triage category.

Table 7.7. Physiological discriminators for disability – neurovascular status

Triage Category	Adult	Paediatric
Category 1		
Category 2	♦ Severe neurovascular compromise, eg. - pulseless - cold - nil sensation - nil movement - decreased capillary refill	♦ Severe neurovascular compromise, eg. - pulseless - cold - nil sensation - nil movement - decreased capillary refill
Category 3	♦ Moderate neurovascular compromise, eg. - pulse present - cool - decreased sensation - decreased movement - decreased capillary refill	♦ Moderate neurovascular compromise, eg. - pulse present - cool - decreased sensation - decreased movement - decreased capillary refill
Category 4	♦ Mild neurovascular compromise, eg. - pulse present - warm - decreased / normal sensation - decreased / normal movement - normal capillary refill	♦ Mild neurovascular compromise, eg. - pulse present - warm - decreased / normal sensation - decreased / normal movement - normal capillary refill
Category 5	♦ No neurovascular compromise	♦ No neurovascular compromise

7.2.7 Mental health emergencies

Table 7.8 displays the physiological discriminators for mental health emergencies, both adult and paediatric, for each triage category.

Table 7.8. Physiological discriminators for mental health emergencies

Triage Category	Adult	Paediatric
Category 1	♦ Definite danger to life (self or others), eg. - violent behaviour - possession of weapon - self destructive behaviour in ED	♦ Definite danger to life (self or others), eg. - violent behaviour - possession of weapon - self destructive behaviour in ED
Category 2	♦ Probable risk of danger to self or others - attempt / threat of self harm - threat to harm others ♦ Severe behavioural disturbance, eg. - extreme agitation / restlessness - physically / verbally aggressive - confused / unable to cooperate - requires restraint	♦ Probable risk of danger to self or others - attempt / threat of self harm - threat to harm others ♦ Severe behavioural disturbance, eg. - extreme agitation / restlessness - physically / verbally aggressive - confused / unable to cooperate - requires restraint
Category 3	♦ Possible danger to self or others, eg. - suicidal ideation ♦ Severe distress ♦ Moderate behavioural disturbance, eg. - agitated / restless - intrusive behaviour - bizarre / disordered behaviour - withdrawn - ambivalence re Tx ♦ Psychotic symptoms, eg. - hallucinations - delusions - paranoid ideas ♦ Affective disturbance, eg. - symptoms of depression - anxiety - elevated / irritable mood	♦ Possible danger to self or others, eg. - suicidal ideation ♦ Severe distress ♦ Moderate behavioural disturbance, eg. - agitated / restless - intrusive behaviour - bizarre / disordered behaviour - withdrawn - ambivalence re Tx ♦ Psychotic symptoms, eg. - hallucinations - delusions - paranoid ideas ♦ Affective disturbance, eg. - symptoms of depression - anxiety - elevated / irritable mood

Table 7.8. Mental health emergencies (continued)

Triage Category	Adult	Paediatric
Category 4	♦ Moderate distress, eg. - no agitation / restlessness - irritable not aggressive - cooperative - gives coherent history ♦ Symptoms of anxiety or depression without suicidal ideation	♦ Moderate distress, eg. - no agitation / restlessness - irritable not aggressive - cooperative - gives coherent history ♦ Symptoms of anxiety or depression without suicidal ideation
Category 5	♦ No danger to self or others ♦ No behavioural disturbance ♦ No acute distress, eg. - cooperative - communicative - compliant with instructions - known patients with chronic symptoms - request for medication - minor adverse effect of medication - financial / social / accommodation / relationship problem	♦ No danger to self or others ♦ No behavioural disturbance ♦ No acute distress, eg. - cooperative - communicative - compliant with instructions - known patients with chronic symptoms - request for medication - minor adverse effect of medication - financial / social / accommodation / relationship problem

These criteria are from the Mental Health Triage Guidelines written by Dr Tobin, Dr Chen and Dr Scott (1999) of the South Eastern Sydney Area Health Service[48]. The Mental Health Triage Guidelines were developed as part of a project that aimed to improve the quality of care provided to people who present to general EDs with mental health problems and were designed to reflect the observed and reported indicators available to the triage nurse[48].

The Mental Health Triage Guidelines developed by Tobin et al. were piloted in early 1999 over five sites. One hundred triage nurses were educated regarding the use of the guidelines and data was collected over 476 mental health presentations[48]. Following implementation of these guidelines the triage of patients to Category 3 (42% vs 40%) and Category 4 (36%) remained unchanged. However there was a small increase in the number of patients triaged to Category 1 (0% vs 3%) and Category 2 (8% vs 14%) and a decrease in the number of patients triaged to Category 5 (14% vs 8%)[48]. 26 triage nurses volunteered to complete 16 patient scenarios allowing the guidelines to be tested for reproducibility and reliability. The mean level of agreement was 84% (range 73% - 100%).

7.2.8 Ophthalmic emergencies

Table 7.9 displays the physiological discriminators for ophthalmic emergencies, both adult and paediatric, for each triage category.

Table 7.9. Physiological discriminators for ophthalmic emergencies

Triage Category	Adult	Paediatric
Category 1		
Category 2	♦ Penetrating eye injury ♦ Chemical injury ♦ Sudden loss of vision with or without injury ♦ Sudden onset severe eye pain	♦ Penetrating eye injury (actual or potential) ♦ Loss of vision ♦ Severe eye pain ♦ Chemical injury
Category 3	♦ Sudden abnormal vision with or without injury ♦ Moderate eye pain, for example; - blunt eye injury - flash burns - foreign body	♦ Sudden abnormal vision with or without injury ♦ Moderate eye pain, for example; - blunt eye injury - flash burns - foreign body
Category 4	♦ Normal vision ♦ Mild eye pain, for example; - flash burns - foreign body	♦ Normal vision ♦ Mild eye pain, for example; - flash burns - foreign body
Category 5	♦ Normal vision ♦ No eye pain - foreign body - red eye	♦ Normal vision ♦ No eye pain - foreign body - red eye

The most urgent ophthalmic emergencies are those that threaten the function of the affected eye(s). Typically the most common presentations of this nature are chemical injuries, penetrating injuries, severe eye pain and sudden loss of vision[49]. It is important in the case of a chemical injury to ascertain the nature of the chemical (acid or alkali) and what first aid (if any) has taken place. Common alkalis are sodium hydroxide and ammonia, which are generally found in cleaning agents, and substances found in mortars, concrete and fertilisers. Alkalis rapidly penetrate the corneal tissue and as they continue to penetrate may ultimately result in damage to the iris, ciliary body and lens. Acids are less penetrating and damage usually occurs during and soon after exposure[49].

Large penetrating injuries are usually obvious at triage however small penetrating injuries may be missed[49]. Typical objects are metal from industrial activities like griding, glass, and garden debris from activities like lawn mowing and "whipper-snippering"[50]. This highlights the importance of history taking if a penetrating eye injury is suspected.

7.2.9 Risk factors for serious illness or injury

There are specific risk factors in both adult and paediatric patients that place them at greater risk of serious illness or injury. These risk factors should be considered in the light of history of events and physiological data. It should be remembered that a patient may be at significant risk of illness or injury and can be physiologically normal at triage. The presence of multiple risk factors, particularly if directly relevant to the patient's presenting problem should be considered seriously and presence of one or more risk factors may result in allocation of triage category of higher acuity. Table 7.10 displays the risk factors for serious illness or injury for both adult and paediatric presentations.

Table 7.10. Risk factors for serious illness or injury

Adult	Paediatric
♦ **Age > 65**	♦ **Age < 1 month and**
	- febrile
	- acute change to feeding pattern
	- acute change to sleeping pattern
♦ **Mechanism of injury e.g.**	♦ **Mechanism of injury e.g.**
- penetrating injury	- penetrating injury
- fall > 5m	- fall > 2 X height
- MCA > 60 kph	- MCA > 60 kph
- MBA / cyclist > 30 kph	- MBA / cyclist
- pedestrian	- pedestrian
- ejection / rollover	- ejection / rollover
- prolonged extrication (> 30 minutes)	- prolonged extrication (> 30 minutes)
- death of same car occupant	- death of same car occupant
- explosion[51]	- explosion[51]
♦ **Co morbidities, e.g.**	♦ **Co morbidities, e.g.**
- respiratory disease	- Hx prematurity
- cardiovascular disease	- respiratory disease
- renal disease	- cardiovascular disease
- carcinoma	- renal disease
- diabetes	- carcinoma
- substance abuse	- diabetes
- immuno-compromised	- substance abuse
- complex medical problems	- immuno-compromised
	- congenital disease
	- complex medical problems

Table 7.10. Risk factors for serious illness or injury (continued)

Adult	Paediatric
♦ **Historical variables, e.g. events preceding presentation to ED** - apnoeic episode - seizure activity - intermittent altered conscious state - collapse	♦ **Historical variables, for example, events preceding presentation to ED, eg.** - apnoeic / cyanotic episode - seizure activity - decreased intake - decreased output - red current jelly stool - bile stained vomiting ♦ **Parental concern**
♦ **Cardiac risk factors, eg.** - smoker - diabetes - family Hx - ↑ cholesterol - ↑ BP - Obesity - Hx AMI / ischaemic heart disease - Other vascular disease[58-60]	
♦ **Victims of violence, eg.** - domestic violence - sexual assault - neglect	♦ **Victims of violence, eg.** - child at risk - sexual assault - neglect
♦ **Other, eg.** - rash - actual / potential effects of drugs / alcohol - chemical exposure - envenomation - immersion - alteration in body temperature	♦ **Other, eg.** - rash - actual / potential effects of drugs / alcohol - chemical exposure - envenomation - immersion - alteration in body temperature

7.2.9.1 Age

Age greater than 65 years has been associated with increased incidence of adverse events and increased morbidity and mortality following an adverse event[44,52-54]. Extremes of age, for example, over 80 years old and neonates may also be considered a risk factor for serious illness or injury. These age groups have physiological differences that place them at increased risk of serious illness and injury. They have decreased physiological reserve, altered physiological responses to illness or injury and may present to the ED with non-specific signs and symptoms[37,55-57].

7.2.9.2 Mechanism of injury

Whilst the direct relationship of mechanism of injury to patient outcome remains under debate, there are specific mechanisms of injury documented in the literature as placing patients at this risk of life threatening injury. The criteria used in these guidelines are derived from the Prehospital Major Trauma Criteria contained in the Review of Trauma and Emergency Services 1999: Final Report[51].

7.2.9.3 Comorbidities

The presence of systemic disease affecting the function of one or more body systems increases the risk of serious illness or injury.

7.2.9.4 Historical variables

The notion of historical variables allows for patients who may present with completely normal physiology at triage but the history of events prior to presentation increases the index of suspicion of serious illness or injury. For example, an infant may present with a history of apnoeic episodes or seizure activity at home. When the infant is assessed at triage he or she may have a completely normal primary survey but the history of events may warrant a triage category of higher acuity than is indicated by the infant's physiological status.

7.2.9.5 Cardiac risk factors

Cardiac risk factors should be considered in those patients who present with an ambiguous history of chest pain or other symptoms[58-60].

7.2.9.6 Other

This category allows for all of the things that do not fit anywhere else.

The actual and potential effects of drugs and alcohol are a risk factor for serious illness and injury. Alcohol was a contributing factor in 16% of trauma related deaths in Victoria (July 1989 - 1995)[61]. The most common causes of deaths in which alcohol was a factor were transport related (40%), suicide (25%), poisoning or overdose (22%), falls (4%) and drowning (2%)[61]. Deaths due to falls whilst under the influence of alcohol were most common in the over 60 years age group and 17% of adults killed in house fires had elevated blood alcohol levels[61]. Patients may also present following ingestion of drugs or alcohol and have a normal primary survey, however the type and amount of drugs / alcohol may make it reasonable to predict physiological deterioration and allocate at triage category of higher acuity than is indicated by the patient's physiological status on arrival.

Alteration in body temperature has been cited as one factor related to patient outcome, specifically temperature < 35.5^0C or > 38.5^0C and hypothermia in trauma patients (temperature < 35^0C) are cited to be a predictor of increased mortality[35,62].

Rash is included to alert the triage nurse to the possibility of serious illness such as anaphylaxis or meningococcal disease however these types of presentations will usually have concurrent primary survey abnormalities. Historical variables indicative of exposure to chemicals or high likelihood of envenomation may also warrant allocation of a triage category of higher acuity than is indicated by the patient's physiological status. Again these patients may exhibit concurrent primary survey abnormalities.

8 Subjective data collection and communication

8.1 Subjective data collection

The triage nurse is the first person that a patient encounters when presenting for emergency care. Given this, the triage nurse should be highly skilled in interpersonal and communication skills. The triage nurse has a responsibility to be polite, professional and reassuring whilst eliciting the information he or she requires making a triage decision.

The collection of subjective data should occur simultaneously with the collection of objective data. Examples of subjective data collected during the triage assessment include:

Chief complaint;

Precipitating event / onset of symptoms;

Mechanism of injury;

Risk factors for serious illness or injury;

Time of onset of symptoms / precipitating event;

Relevant past history.

The collection of subjective data should be performed in a timely and efficient manner. The triage nurse should however be aware that in general, when patients (and others) present to the ED they are experiencing a certain level of crisis. This level of crisis may not always correspond with that expected for the severity of presenting complaint. The triage nurse must be cognisant of the fact that patients (and others) may have heightened sensibilities when they present to the ED and may misinterpret what is intended as effective, efficient questioning as rude or dismissive.

In the ideal world, the triage assessment would occur in a quiet non-threatening environment that is free from interruptions. In reality, there may be a queue of ambulant patients stretching to the door, the telephone ringing and multiple ambulances arriving at once. Making the best of a less than ideal environment may include:

Addressing the patient by name (this may be particularly easy if they present with a doctor's letter or with their Medicare or hospital card already available);

Excusing your self if you need to answer the telephone or attend to another patient, for example "I'm sorry Mrs Smith, I'll just need to attend to this gentleman / ambulance / telephone call. Please take a seat over there, I won't be long" and re-establishing contact when you return, for example "I'm sorry, now you were telling me about ……..";

Altering your communication style to suit the patient from whom you are trying to elicit information, for example, kneeling down if talking to a child;

Adjusting the type of interview questions, for example, the use of multiple closed questions to rapidly establish information, for example "do you have pain right now?";

Ask one question at a time and avoid questions that contain long lists, for example "do you have chest pain, shortness or breath, nausea or dizziness?" Even though it may take a little longer to ask the questions, it will help to gather more accurate information;

Avoid "why" questions, for example, "why didn't you come to hospital sooner?"; "why have you come today when you've had this for three days?" These questions may be interpreted as accusatory. If there is a need for patient education, advice should be constructive and not condescending, for example, "next time you have chest pain you should come to the hospital straight away - it is really important because …..";

If patients are having difficulty giving you the information that you want, provide simple alternatives. For example, ask the patient "is the pain sharp like a knife, burning like fire or heavy like something sitting on you?" or "when you said there was a lot of bleeding, was there a spoonful, a cupful or a bucketful?"

8.2 Provision of information

The role of the triage nurse includes liaison with members of the public (patients and others) and other health care professionals[2]. All people seeking emergency care are entitled to information regarding:

The triage process;

Patient flow through the ED;

Potential management plans;

Specific ED conventions[1].

This information may be given verbally by the triage nurse or may be in written form such as brochures, posters or signage.

8.2.1 The triage process

Patients (and their families) should have access to information regarding the triage process. This information should include a simple explanation of the principles of triage, the triage categories, how the patient has been categorised and their intended waiting time[1]. The reason for delays in waiting times, for example, arrival of multiple seriously ill or injured patients, medical and / or nursing workload issues should also be explained to patients.

8.2.2 Patient flow

Patients (and their families) should receive an explanation of what they may expect whilst in the ED[1]. An example may be "when it is your turn one of the nurses will come out and call you into a cubicle. You will be asked to change into a gown and then a nurse will assess you. The nurse may start some of your investigations, for example, ECG or blood tests and will care for you until the doctor is able to see you".

8.2.3 Potential management plans

Patients (and their families) should be given information regarding potential management as appropriate, for example "your injury is likely to need an operation to repair it so you will not be able to eat or drink until the doctor has seen you"[1].

8.2.4 Specific ED conventions

Patients (and their families) should be made aware of conventions that are specific to your ED, for example, regulations regarding visitors (if any), food and drink etc[1].

8.3 Waiting times - what not to say

The role of the triage nurse is to be helpful to those who present for emergency care or seeking information. There are common questions that you may be asked at triage and the way in which you answer them can impact greatly on the patient (or others):

"How long is the wait?"

If you take this question on face value and tell this patient "about 2 hours" you may have negated the whole triage process, particularly if the patient has a presenting problem that is actually or potentially life threatening. There is also the danger that the patient will respond politely with "Thanks very much, I'll go to my own doctor" and leave the ED without you ever knowing what the problem actually was and / or without being assessed.

A more appropriate response would be "it depends on the nature of your problem, how can I help you today?" At least if this patient has crushing central chest pain, or has fallen a great height off a roof you will know about it.

If this question is coming from a patient who has already been triaged and for whom you are caring for in the waiting room, be cautious in how you answer this question. Firstly, you should elicit why they are asking - is it because their symptoms are worse? Does this patient warrant re-triage and medial assessment or intervention because they have deteriorated?

Secondly, if you say, for example, thirty minutes and then your ED receives one or two patients with life threatening illness or injury, waiting times will often become prolonged as a consequence and the patient (or others) may perceive that you have lied. It may be better to say something like "at the moment there are three people in front of you. If all is well, this should mean that you should be seen in around … minutes. However, patients in the ED are not seen in order of arrival, they are seen according to the seriousness of the problem. This means that if a patient was to arrive now and they were not breathing, we would see that patient first and this may make your waiting time longer. Unfortunately I can not predict how many patients will arrive".

"I've been waiting … hours - when will I see the doctor?"

There is no simple solution to placating patients who are experiencing prolonged waiting times for whatever reason. Whilst it is reasonable to offer patients (and others) an explanation for their prolonged waiting time, some explanations will be more likely to offend than others.

"We've had a lot of emergencies today" may be met with a response such as "but I am an emergency". It may be more appropriate to give patients (and others) a frame of reference, for example, "there has been a really bad car accident and we have just received 2 patients with life threatening injuries" or "we are treating a patient who is not breathing and whose heart has stopped. This is taking up a lot of our doctors and nurses".

Whenever a patient (or others) is asking about the waiting time and it is a particularly busy shift, often there is not much you can do to make a difference to the time until a doctor sees the patient. However, there are things that you can do.

You may need to tell the patient (and others) that there are still numerous patients to be seen before them but you may want to ask them "can I do something for you while you are waiting?" Simple things like providing a drink or blanket may be all the patient requires to increase their comfort while they wait. Depending on the organisation for which you work, you may be able to consider some nurse-initiated interventions that will expedite patient care (see Secondary triage decisions).

9 Secondary triage decisions

Nursing interventions initiated by the triage nurse must be regarded as a secondary triage role, and in all but life or limb threatening circumstances; *should take place following the primary triage decision*[1]. Secondary assessment and interventions often occur once the patient is in their allocated cubicle but under some circumstances these may occur at triage or in the waiting room.

The initiation of nursing interventions by the triage nurse, particularly whilst the patient is waiting to see a doctor, have potential to impact on the health outcomes of patients[19]. The initiation of nursing interventions is an important aspect of the role of the triage nurse and again relies on the clinical decisions made by triage nurses[19]. Secondary triage decisions may be made independently by the triage nurse, in conjunction with guidelines or protocols or after obtaining a doctor's order[19].

The aim of initiation of nursing interventions at triage is to:

Provide basic life support as required;

Expedite definitive management within the emergency department;

Promote patient comfort; and

Maximise patient satisfaction with emergency care[1].

Nurse initiated interventions at triage must:

Only be conducted with the patient or carers permission;

Ensure an appropriate level of privacy for the patient;

Not delay medical assessment;

Be clearly explained to the patient;

Be documented;

Be in accordance with organisational guidelines for nurse initiated practice[1].

Examples of nurse initiated interventions to expedite care at triage may include:

Administration of analgesia;

Administration of antipyretics;

Administration of oral rehydration;

Administration of oxygen therapy;

Blood glucose measurement;

Collection of blood for pathology studies;

First aid (BLS, splinting, RICE, eye irrigation);

Facilitating referral to related services;

IV cannulation;

Ordering of X-rays for patients with isolated limb injury;

Plaster of Paris checks;

Urinalysis;

Weight;

Wound management[1].

All nurse-initiated interventions should be in accordance with organisational guidelines and policies[1].

Triage decisions should be based on the patient's individual need for care and all patients should be allocated a triage category according to their objective clinical urgency[6]. The presence of specific organisational systems, including the initiation of interventions by the triage nurse should not affect triage category allocation[9].

9.1 Referral to other health care providers

In Australia, every person has the right to present to an ED. Although appropriate referral to other health care providers is part of the role of the triage nurse, referral away from the ED should be undertaken cautiously on the part of the triage nurse and voluntarily on the part of the patient.

Research has shown that as many as three quarters (74.9%) of triage nurses frequently (several times per shift, daily or weekly) and independently refer non urgent patients (Category 5) to a general practitioner[21]. As triage nurses are required to both justify and be accountable for their clinical decisions, the decision to refer a patient away from the ED places the triage nurse and the organisation for which he or she works at significant medicolegal risk[19,21]. There are questions regarding the adequacy and medico legal acceptability of examinations conducted in the triage environment and no specific standards by which the triage nurse can practice[21]. The consequences of poor decisions are potentially magnified if the triage nurse refers a patient away from the ED and can range from a delay in treatment to the death of a patient[21].

If the patient is to be referred to another health care provider, they should always be provided with the rationale for the referral. It is also the responsibility of the triage nurse to provide first aid prior to referral, for example, application of a sling or simple dressing. Referral away from the ED should also include consultation with the health care provider to whom the patient is being referred to ensure that they are able to provide appropriate investigations or interventions. At this point in time there are no legal requirements regarding referral away from the ED[21]. The triage nurse may transfer the responsibility of making this decision to the patient but this does not absolve the triage nurse or the organisation from risk. If the patient suffered an adverse health outcome, there is still potential for the ED and the triage nurse to be held accountable for an act of omission. Given the potential risks involved in referral away from the ED, this practice should only be undertaken in accordance with specific ED guidelines.

9.2 Ongoing assessment and care of patients in the triage / waiting area

The ongoing assessment and care of patients triaged to the triage / waiting area is the responsibility of the triage nurse. All patients who have exceeded the waiting time as deemed appropriate by their triage category and who remain in the waiting area should have a documented reassessment by the triage nurse.

The triage nurse has a responsibility to inform all patients triaged to the waiting area to report back to the triage nurse if they feel unwell, have pain or require assistance whilst they wait. This is particularly important if you know that waiting times will be prolonged. The triage nurse also has a responsibility to take a proactive role and approach those patients who appear to have increased symptoms whilst in the waiting room or patients who have had particularly prolonged waiting times.

10 Organizational and community resources

The triage nurse should be aware of resources both within the organisation and the community in which he or she works. It is also the responsibility of the triage nurse to refer appropriately to these resources. Examples of resources available are listed in the ENA Position Statement: Educational Preparation of Triage Nurses provided in Appendix 3.

11 Documentation

Every triage episode should be documented. Documentation of the triage assessment should reflect, if not justify, the triage category selected by the triage nurse. ACEM state that documentation of the triage assessment should include at least the following:

Date and time of triage assessment;

Name of the triage nurse;

Chief complaint / presenting problem;

Limited relevant history;

Relevant assessment findings;

Triage category;

Assessment and treatment area allocated;

Diagnostic, first aid or treatment initiated at triage[9].

11.1 Re-triage

A process of re-triage should be undertaken if a patient's condition changes whilst they are waiting or if additional information that impacts of the patient's clinical condition becomes available. Both the initial triage category and the re-triage category should be recorded as should the time and reason for re-triage[9]. There will be different organisation specific processes for the documentation of patients requiring re-triage. It is the responsibility of the triage nurse to seek out this information prior to independent practice in the triage role.

11.2 Referral to other health care providers

As mentioned previously, the triage nurse has a responsibility to be familiar with the specific organisational documentation requirements regarding triage away from the ED.

12 Risk management

There is a dual responsibility between the triage nurse and the organisation to ensure a safe triage environment for staff, patients and others[1]. The importance of safety as a priority in emergency situations is clearly documented and safety of rescuers, victims and bystanders is given precedence over assessment of airway, breathing and circulation[63]. These principles are readily applied to the triage context and the safety of the triage nurse, presenting patient and those present in the waiting room are of paramount importance.

12.1 Aggression management

One of the most obvious safety issues for the triage nurse is the management of the violent or aggressive person. The triage nurse should be able to recognise and manage appropriately aggressive and / or violent behaviour. This includes:

Access to training and education in aggression / conflict management;

Knowledge of emergency and security procedures, for example, access and egress points at triage, duress alarms, security personnel, locking doors, code black, police assistance;

Identification of potential weapons both on persons and in the triage area, for example, objects that could be thrown[1].

12.2 Patient retrieval

On occasion, the triage nurse is required to retrieve patients from outside the confines of the waiting area, but within the confines of the ED, most commonly from the ambulance bay or car park areas. The triage nurse should be able to facilitate retrieval of patients, from appropriate areas, without personal risk. This includes:

Knowledge of the geographical boundaries of responsibility and knowledge of emergency procedures if the patient is beyond geographical boundaries, for example, ambulance assistance;

Assessment of risk, for example, personal safety, lifting and patient movement issues;

Identification and mobilisation of required resources, for example security personnel, ED personnel, lifting devices, wheelchair, patient trolley;

Adequate equipment, for example gloves, protective clothing, bag - valve- mask device[1].

12.3 Safety of persons in the waiting area

As the triage nurse is responsible for the care of patients (and others) in the waiting area, it is also the responsibility of the triage nurse to ensure a safe environment for those in the waiting area. This includes:

Prevention of falls, for example, removal of obstacles, access to wheelchairs;

Rapid identification of deterioration of patients, for example, adequate visibility of waiting area;

Initiation of appropriate patient interventions, for example, location of emergency buzzer, bag-valve-mask device, code blue, bandages, splints;

See aggression management[1].

12.4 Environmental Hazards

The triage nurse may encounter environmental hazards that require specific precautions. These include:

Identification and appropriate interventions for the management of blood and body fluids, for example, access to gloves, hand washing facilities, protective eye wear, protective clothing, management of body fluid spills;

Identification and appropriate interventions for the management of chemical, biological and radiological hazards, for example, access to protective clothing, knowledge of decontamination procedures[1].

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Appendix 2a: APD developed for the Australasian (National) Triage Scale

These physiological discriminators have been based on the Adult Discriminators for National Triage Scale Categories in the Emergency Nurses' Association of Victoria (2000) Position Statement: Educational Preparation of Triage Nurses p. 7-8 (*see appendix 3*). The signs and symptoms listed are examples only. Patients may or may not necessarily display all of the signs or symptoms listed or exhibit alternative signs or symptoms to those listed.

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Airway	♦ Obstructed ♦ Partially Obstructed	♦ Patent	♦ Patent	♦ Patent	♦ Patent
Breathing	♦ Absent respiration or hypoventilation ♦ Severe respiratory distress, eg. - severe use accessory muscles - unable to speak - central cyanosis - altered conscious state	♦ Respiration present ♦ Moderate respiratory distress, eg. - moderate use accessory muscles - speaking in words - skin pale / peripheral cyanosis	♦ Respiration present ♦ Mild respiratory distress, eg. - minimal use accessory muscles - speaking in short sentences - skin pink	♦ Respiration present ♦ No respiratory distress, eg. - no use of accessory muscles - speaking in full sentences	♦ Respiration present ♦ No respiratory distress, eg. - no use of accessory muscles - speaking in full sentences
Circulation	♦ Absent circulation ♦ Severe haemodynamic compromise, eg. - absent peripheral pulses - skin pale, cold, moist - significant alteration in HR - altered conscious state ♦ Uncontrolled haemorrhage	♦ Circulation present ♦ Moderate haemodynamic compromise, eg. - absent radial pulse but palpable brachial - skin pale, cool, moist - moderate alteration in HR	♦ Circulation present ♦ Mild haemodynamic compromise, eg. - palpable peripheral pulses - skin pale, cool, dry - mild alteration in HR	♦ Circulation present ♦ No haemodynamic compromise, eg. - palpable peripheral pulses - skin pale / pink, warm, dry	♦ Circulation present ♦ No haemodynamic compromise, eg. - palpable peripheral pulses - skin pink, warm, dry

Adult Physiological Discriminators for the Australasian (National) Triage Scale (*continued*)

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Disability	♦ GCS < 8	♦ GCS 9 - 12	♦ GCS > 13	♦ Normal GCS or no acute to usual GCS	♦ Normal GCS or no acute to usual GCS
	♦	♦ Severe pain, eg. - patient reports severe pain - skin, pale, cool - severe alteration in vital signs - requests analgesia	♦ Moderate pain, eg. - patient reports moderate pain - skin, pale, warm - moderate alteration in vital signs - requests analgesia	♦ Mild pain, eg. - patient reports mild pain - skin, pink, warm - mild alteration in vital signs - requests analgesia	♦ No or mild pain, eg. - patient reports mild pain - skin, pink, warm - no alteration in vital signs - declines analgesia
	♦	♦ Severe neurovascular compromise, eg. - pulseless - cold - nil sensation - nil movement - ↓ capillary refill	♦ Moderate neurovascular compromise, eg. - pulse present - cool - sensation - movement - ↓ capillary refill	♦ Mild neurovascular compromise, eg. - pulse present - warm - normal / ↓ sensation - normal / ↓ movement - normal capillary refill	♦ No neurovascular compromise

Adult Physiological Discriminators for the Australasian (National) Triage Scale (*continued)*

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Mental Health Emergencies *- used with permission from South Eastern Sydney Area Health Service;* *Tobin D, Chen, L, Scott, E. 1999. Development and Implementation of Mental Health Triage Guidelines for Emergency Departments. South Eastern Sydney Area Health Service.*	♦ Definite danger to life (self or others), eg. - violent behaviour - possession of a weapon - self destruction	♦ Probable danger to life (self or others), eg. - attempt / threat of self harm - threat of harm to others ♦ Severe behavioural disturbance, eg. - extreme agitation / restlessness - physically / verbally aggressive - confused / unable to cooperate ♦ Requires restraint	♦ Possible danger to life, eg. - suicidal ideation ♦ Severe distress ♦ Moderate behavioural disturbance, eg. - agitated / restless - intrusive behaviour - bizarre / disordered behaviour - withdrawn - ambivalence re Tx ♦ Psychotic symptoms, eg. - hallucinations - delusions - paranoid ideas ♦ Affective disturbance, eg. - symptoms of depression - anxiety - elevated or irritable mood	♦ Moderate distress, eg. - no agitation / restlessness - irritable not aggressive - cooperative - gives coherent history - symptoms of anxiety or depression without suicidal ideation	♦ No danger to self or others ♦ No behavioural disturbance ♦ No acute distress, eg. - cooperative - communicative - compliant with instructions - known patients with chronic symptoms - request for medication - minor adverse effect of medication - financial / social / accommodation / relationship problem

Adult Physiological Discriminators for the Australasian (National) Triage Scale (*continued*)

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Ophthalmic Emergencies		♦ Penetrating eye injury ♦ Chemical injury ♦ Sudden loss of vision with or without injury ♦ Sudden onset severe eye pain	♦ Sudden abnormal vision with or without injury ♦ Moderate eye pain, eg. - blunt eye injury - flash burns - foreign body	♦ Normal vision ♦ Mild eye pain, eg. - blunt eye injury - flash burns - foreign body	♦ Normal vision ♦ No eye pain

Risk factors for serious illness or injury

should be considered in the light of history of events and physiological data

multiple risk factors = increased risk of serious injury

presence of one or more risk factors may result in allocation of triage category of higher acuity

♦ Mechanism of injury, eg.
- penetrating injury
- fall > 5m
- MCA > 60 kph
- MBA / cyclist > 30 kph
- pedestrian
- ejection / rollover
- prolonged extrication (> 30 minutes)
- death same car occupant
- explosion

♦ Co morbidities, eg.
- respiratory disease
- cardiovascular disease
- renal disease
- carcinoma
- diabetes
- substance abuse
- immuno-compromised
- complex medical problems

♦ Age > 65 years

♦ Historical variables, eg.
- events preceding presentation to ED
- apnoeic episode
- seizure activity
- intermittent altered conscious state
- collapse

♦ Cardiac risk factors, eg.
- smoker / obesity
- diabetes / +ve family Hx
- cholesterol / ↑ BP
- known coronary artery disease

♦ other vascular disease, eg. PVD

♦ Victims of violence, eg.
- domestic violence
- sexual assault
- neglect

♦ Other, eg.
- rash
- actual / potential effects of drugs / alcohol
- chemical exposure
- envenomation
- immersion
- alteration in body temperature

Appendix 2b: PPD developed for the Australasian (National) Triage Scale

The discriminators are examples and have been based on the Adult Discriminators for National Triage Scale Categories in the Emergency Nurses' Association of Victoria (2000) Position Statement: Educational Preparation of Triage Nurses p. 7-8 (*see appendix 3*).

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Airway	♦ Obstructed ♦ Partially obstructed with severe respiratory distress	♦ Patent ♦ Partially obstructed with moderate respiratory distress	♦ Patent ♦ Partially obstructed with mild respiratory distress	♦ Patent	♦ Patent
Breathing	♦ Absent respiration or hypoventilation ♦ Severe respiratory distress, eg. - severe use accessory muscles - severe retraction - acute cyanosis	♦ Respiration present ♦ Moderate respiratory distress, eg. - moderate use accessory muscles - moderate retraction - skin pale	♦ Respiration present ♦ Mild respiratory distress, eg. - mild use accessory muscles - mild retraction - skin pink	♦ Respiration present ♦ No respiratory distress - no use accessory muscles - no retraction	♦ Respiration present ♦ No respiratory distress - no use accessory muscles - no retraction
Circulation s/s dehydration ↓ LOC / activity cap refill < 2 sec dry oral mucosa sunken eyes ↓ tissue turgor absent tears deep respirations thready / weak pulse tachycardia ↓ urine output	♦ Absent circulation ♦ Significant bradycardia, eg. - HR < 60 in an infant ♦ Severe haemodynamic compromise, eg. - absent peripheral pulses - skin pale, cold, moist, mottled - significant tachycardia - capillary refill > 4 secs ♦ Uncontrolled haemorrhage	♦ Circulation present ♦ Moderate haemodynamic compromise, eg. - weak / thready brachial pulse - skin pale, cool, - moderate tachycardia - capillary refill 2-4 secs ♦ > 6 s/s dehydration	♦ Circulation present ♦ Mild haemodynamic compromise, eg. - palpable peripheral pulses - skin pale, warm - mild tachycardia ♦ 3 - 6 s/s dehydration	♦ Circulation present ♦ No haemodynamic compromise, eg. - palpable peripheral pulses - skin pink, warm, dry ♦ < 3 s/s dehydration	♦ Circulation present ♦ No haemodynamic compromise, eg. - palpable peripheral pulses - skin pink, warm, dry ♦ No s/s dehydration

Paediatric Physiological Discriminators for the Australasian (National) Triage Scale (*continued*)

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Disability	♦ GCS < 8	♦ GCS 9 – 12 ♦ Severe decrease in activity, eg. - no eye contact, - decreased muscle tone	♦ GCS > 13 ♦ Moderate decrease in activity, eg. - lethargic - eye contact when disturbed	♦ Normal GCS or no acute change to usual GCS ♦ Mild decrease in activity, eg. - quiet but eye contact - interacts with parents	♦ Normal GCS or no acute change to usual GCS ♦ No alteration to activity, eg. - Playing - smiling
		♦ Severe pain, eg. - patient / parents report severe pain - skin, pale, cool - alteration in vital signs - requests analgesia	♦ Moderate pain, eg. - patient / parents report moderate pain - skin, pale, warm - alteration in vital signs - requests analgesia	♦ Mild pain, eg. - patient / parents report mild pain - skin, pink, warm - no alteration in vital signs - requests analgesia	♦ No or mild pain, eg. - patient / parents report mild pain - skin, pink, warm - no alteration in vital signs - declines analgesia
		♦ Severe neurovascular compromise, eg. - pulseless - cold - nil sensation - nil movement - ↓ capillary refill	♦ Moderate neurovascular compromise, eg. - pulse present - cool - sensation - movement - ↓ capillary refill	♦ Mild neurovascular compromise, eg. - pulse present - normal / ↓ sensation - normal / ↓ movement - normal capillary refill	♦ No neurovascular compromise

Paediatric Physiological Discriminators for the Australasian (National) Triage Scale (*continued*)

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Mental Health Emergencies *- used with permission from South Eastern Sydney Area Health Service;* *Tobin D, Chen, L, Scott, E. 1999. Development and Implementation of Mental Health Triage Guidelines for Emergency Departments. South Eastern Sydney Area Health Service*	♦ Definite danger to life (self or others), eg. - violent behaviour - possession of a weapon - self destruction	♦ Probable danger to life (self or others), eg. - attempt / threat of self harm - threat of harm to others ♦ Severe behavioural disturbance, eg. - extreme agitation / restlessness - physically / verbally aggressive - confused / unable to cooperate ♦ Requires restraint	♦ Possible danger to life, eg. - suicidal ideation ♦ Severe distress ♦ Moderate behavioural disturbance, eg. - agitated / restless - intrusive behaviour - bizarre / disordered behaviour - withdrawn - ambivalence re Tx ♦ Psychotic symptoms, eg. - hallucinations - delusions - paranoid ideas - Affective disturbance, eg. - symptoms of depression - anxiety - elevated or irritable mood	♦ Moderate distress, eg. - no agitation / restlessness - irritable not aggressive - cooperative - gives coherent history - symptoms of anxiety or depression without suicidal ideation	♦ No danger to self or others ♦ No behavioural disturbance ♦ No acute distress, eg. - cooperative - communicative - compliant with instructions - known patients with chronic symptoms - request for medication - minor adverse effect of medication - financial / social / accommodation / relationship problem

Paediatric Physiological Discriminators for the Australasian (National) Triage Scale (*continued*)

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Ophthalmic Emergencies		♦ Penetrating eye injury ♦ Chemical injury ♦ Sudden loss of vision with or without injury ♦ Sudden onset severe eye pain	♦ Sudden abnormal vision with or without injury ♦ Moderate eye pain, eg. - blunt eye injury - flash burns - foreign body	♦ Normal vision ♦ Mild eye pain, eg. - blunt eye injury - flash burns - foreign body	♦ Normal vision ♦ No eye pain

Risk factors for serious illness or injury

should be considered in the light of history of events and physiological data

multiple risk factors = increased risk of serious injury

presence of one or more risk factors may result in allocation of triage category of higher acuity

♦ Mechanism of injury, e.g. - penetrating injury - fall > 2 X height - MCA > 60 kph - MBA / cyclist > 30 kph - pedestrian - ejection / rollover - prolonged extrication (> 30 minutes) - death same car occupant - explosion	♦ Co morbidities, eg. - Hx prematurity - respiratory disease - cardiovascular disease - renal disease - carcinoma - diabetes - substance abuse - immuno-compromised - congenital disease - complex medical Hx	♦ Age < 1 month and - febrile - acute change to feeding pattern - acute change to sleeping pattern ♦ Victims of violence, e.g. - child at risk - sexual assault - neglect	♦ Historical variables, for example, events preceding presentation to ED - apnoeic / cyanotic episode - seizure activity - decreased intake - decreased output - red current jelly stool - bile stained vomiting ♦ Parental concern	♦ Other, e.g. - rash, - actual / potential effects of drugs / alcohol - chemical exposure - envenomation - immersion - alteration in body temperature

Appendix 3: ENA Position Statement: Triage

Introduction

The triage nurse is the first contact for all people entering the Emergency Department: triage is the point at which emergency care begins. It is the intention of this position statement to promote national triage consistency including the application of the National Triage Scale, standards of care at triage and educational preparation of triage nurses.

This position statement is designed for use within organisations that have an accredited Emergency Department. The Emergency Nurses Association of Victoria (Inc) will act as a consultative body regarding issues surrounding triage practice.

It is the view of the Emergency Nurses Association of Victoria (Inc) that all triage decisions be based on the clinical condition of individual patients. Adjustment of triage practice to accommodate departmental workloads or funding mechanisms negates an effective triage system.

Characteristics of the Triage Nurse

Clinical decisions made by triage nurses represent complex cognitive processes. Triage nurses must be able to think critically in an environment where available data may be minimal or ambiguous and within a limited time frame.

ENA recommends that the triage nurse:

i. Is competent and able to function independently in all aspects of emergency nursing prior to undertaking the triage role;

ii. Performs to the minimum standards (Emergency Nursing) as identified by ENA;

iii. Performs to the minimum standards (Triage) as identified by ENA;

iv. Demonstrates accountability for his / her triage decisions; and

v. Has completed at least one year of post registration practice in emergency nursing.

Role of the Triage Nurse

Triage is an autonomous nursing role and is essential to the efficient delivery of emergency care. This role is underpinned by the triage nurse's communication skills.

ENA recommends that triage is performed by a Registered Nurse (Division 1). The role of the triage nurse is to:

i. Allocate a NTS category based on patient assessment;

ii. Initiate appropriate nursing interventions to expedite patient care:

   first aid,

   appropriate referral to other health care professionals,

   initiation of organisational guidelines, e.g. x-ray, administration of analgesia; and

iii. Liaise with members of the public (patients and others) and other healthcare professionals.

Minimum Practice Standards

Clinical decisions made by triage nurses must be informed by knowledge of a wide range of illness and injury patterns and current research literature.

ENA recommends that the triage nurse will:

i. As first priority, assess all patients who present for emergency care and allocate a NTS category;

ii. Initiate nursing interventions in conjunction with organisational guidelines;

iii. Ensure reassessment and ongoing management of patients who remain in the waiting room within a suitable time frame as determined by their NTS category;

iv. Provide patient and public education where necessary:

health promotion and education,

injury prevention,

community resource information;

v. Demonstrate accountability for practice through accurate and ongoing documentation and use of clinical information systems; and

vi. Participate in processes of audit and evaluation of triage practice.

Minimum Environmental Standards

There is a dual responsibility between the organisation and the triage nurse to ensure a safe triage environment.

ENA recommends that the triage environment provide safety for both the patient and the triage nurse. As such the triage nurse should:

i. Be immediately accessible and well sign posted;

ii. Have an area for patient examination;

iii. Allow patient privacy;

iv. Be able to visualise the entrance and waiting area;

v. Have access to emergency equipment:

bag-valve-mask device

medical emergency assistance system

vi. Practice universal precautions by having access to:

handwashing facilities, provision of eye wear, gloves, and gowns

vii. Ensure the safety of the triage nurse;

have access to duress alarms and security personnel.

Appendix 4: ENA Position Statement: Educational Preparation of Triage Nurses

Introduction

Emergency nurses must be prepared for the triage role via structured, unit based education programmes informed by nationally established triage standards.

ENA recommends that all triage nurses undertake educational preparation prior to undertaking the triage role. Institutional guidelines should also be acknowledged.

This position statement is to be read in conjunction with the Emergency Nurses' Association of Victoria (Inc) Position Statement: Triage.

Objectives

Following completion of an educational programme, the triage nurse should be able to:

i. Define the role of the triage nurse, (as noted in Position Statement: Triage) and demonstrate an understanding of the principles of triage;

ii. Demonstrate an understanding of the NTS;

iii. Perform an accurate triage assessment and allocate a NTS category based on that assessment;

iv. Demonstrate an ability to prioritise patients on the basis of clinical presentation and allocate presenting patients to an appropriate area of the ED;

v. Initiate appropriate nursing interventions;

vi. Demonstrate an understanding of institutional and community resources;

vii. Identify avoidable hazards that may threaten another's well being;

viii. Utilise the problem solving approach when dealing with emergency situations.

(i) Principles of triage:

Formal process of immediate assessment of all patients who present to the ED;

Classifies patients into groups according to severity of illness or injury;

Effective triage systems aim to promote patient safety by:

accurate initial assessment and prioritising of patients according to illness or injury severity,

ensuring immediate intervention and greatest resource allocation to patients with life threatening illness or injury;

In Australia, triage is predominantly a nursing assessment that begins when the patient presents to the ED;

Triage is an ongoing process involving continuous assessment and reassessment;

The triage process should rapidly identify life threatening states and also the potential for these states to occur; and

Triage decisions are a primary factor in the initiation of emergency care and therefore may have a profound effect on the health outcomes of patients who present for emergency care.

(ii) National Triage Scale:

Is a five category triage scale derived from the Ipswich and Box Hill Triage Scales;

Was formulated in 1993 by the ACEM with the aim to "…standardise the nomenclature and descriptors of … triage categories for use in Emergency Departments in Australia…" (Australasian College for Emergency Medicine 1993);

The five triage categories used in the NTS are:

Numeric Code	Category	Treatment Acuity	Colour Code
1	Resuscitation	Immediate	Red
2	Emergency	Minutes (< 10 mins)	Orange
3	Urgent	Half hour	Green
4	Semi-urgent	One hour	Blue
5	Non-urgent	Two hours	White

At the present time, selection and allocation of a triage category is based on the nature of the patient's presenting problem and the need for *medical intervention* (Australasian College for Emergency Medicine, 1993) as determined by the triage nurse;

Triage decisions should be based on the patient's individual need for care (Commonwealth department of Health and Family Services and Australasian College for Emergency Medicine, 1997) and should not be affected by Emergency Department workloads, performance criteria or financial incentives;

At the present time the NTS is evaluated via the use of admission rates for each triage category (Australasian College for Emergency Medicine, 1993b);

There are also indicator thresholds for each triage category. These are the percentage of patients who receive medical intervention within the time frame stated for their triage category, some Emergency Department funding is dependent on the number of patients seen within their required time frame.

(iii) Triage assessment (including NTS category allocation and ED area allocation):

Should be based on the primary survey:

Immediate interventions should be initiated for any breech of the primary survey:

BLS in the event of respiratory / cardiac arrest,

application of pressure in the event of haemorrhage.

The triage assessment consists of subjective and objective data:

Subjective data:

chief complaint,

precipitating event / onset of symptoms,

mechanism of injury,

time of onset of symptoms / precipitating event,

relevant past history;

Objective data:

primary survey,

see (iv) adult discriminators for NTS categories.

Secondary assessment and interventions usually occur once the patient is in their allocated cubicle but under some circumstances these may occur at triage (or in the waiting room). See (v) initiation of nursing interventions.

Order of triage should not be restricted to order of arrival but should be based on "across the room" assessment of patients waiting to be triaged.

(iv) Adult Discriminators for National Triage Scale Categories

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Airway	Obstructed Partially Obstructed	Patent	Patent	Patent	Patent
Cervical Spine	Mechanism of injury Neurological deficit Abnormal primary survey	Mechanism of injury Neurological deficit Normal primary survey	Mechanism of injury High suspicion of injury No neurological deficit	Mechanism of Injury Low suspicion of injury No neurological deficit	No mechanism of injury
Breathing	Absent respiration Severe respiratory distress ♦ unable to speak ♦ centrally cyanosed ♦ severe use accessory muscles	Respiration present Moderate respiratory distress ♦ speaking in words ♦ peripheral cyanosis ♦ moderate use accessory muscles	Respiration present Mild respiratory distress ♦ speaking in short sentences ♦ skin pink ♦ minimal use accessory muscles	Respiration present Nil respiratory distress ♦ speaking in full sentences ♦ nil accessory muscle use ♦ normal RR	No respiratory distress
Circulation	Absent circulation Skin pale, moist, cool Uncontrolled haemorrhage	Circulation present Skin pale, cool, moist Palpable brachial pulse Semi controlled haemorrhage	Circulation present Skin pink/pale , warm, dry Palpable radial pulse Controlled haemorrhage	Circulation present HR normal Skin pink, warm, dry Nil history of haemorrhage	No cardiovascular insult
Disability	GCS < 8	GCS 9-12 Severe pain > $^{7}/_{10}$ Severe neurovascular compromise ♦ pulseless ♦ cold ♦ nil sensation ♦ decreased capillary refill	GCS > 13 Moderate pain > $^{3-6}/_{10}$ Moderate neurovascular compromise ♦ pulse present ♦ cool ♦ decreased sensation ♦ normal / decreased capillary refill	Normal GCS Mild pain < $^{3}/_{10}$ Nil neurovascular compromise ♦ pulse present ♦ normal sensation ♦ normal capillary refill	Normal GCS No pain < $^{3}/_{10}$ Nil neurovascular compromise

(iv) Adult Discriminators for National Triage Scale Categories

	Cat 1	Cat 2	Cat 3	Cat 4	Cat 5
Mechanism of Injury Fall > 3m MCA > 60 kph MBA / cyclist pedestrian ejection / rollover		Mechanism of injury and: Death of same car occupant Normal primary survey Abnormal GCS	Mechanism of injury and; Normal primary survey Normal GCS		
Psychiatric Emergencies (from Pollard, C. 1998. Mental Health Triage & Assessment for Emergency Medicine)		Violent, aggressive patient Suicidal patient Danger to self / others	Distressed patient Psychotic patient Likely to become aggressive Danger to self and others Situational crisis	Long standing mental health disorder Support person present (family, community mental health nurse etc.)	Long standing non acute mental health disorder No support person present
Ophthalmologic Emergencies	Penetrating eye injury – object insitu	Penetrating eye injury ? penetrating eye injury Chemical injury irrigated at scene / not irrigated with pain Loss of vision following injury	Blunt eye injury Flash burns Chemical injury, irrigated at scene, no pain Foreign body with moderate pain Abnormal vision following injury	Foreign body with mild pain Normal vision	
Placement within the Emergency Department	Resuscitation area	Resuscitation area or monitored area	Monitored area or General cubicle	General cubicle	General cubicle, waiting room or primary care area

(v) Initiate appropriate interventions aimed at expediting care:

The delivery of nursing care at triage must be regarded as the secondary triage role, and in all but life or limb threatening circumstances, ***it should take place following the primary triage decision*** (to allocate a triage code according to the National Triage Scale).

The aim of nursing care provided at triage is to:

1. Provide basic life support as required;
2. Expedite definitive management within the emergency department;
3. Prevent further injury / illness;
4. Maximise patient satisfaction through timely communication, evaluation and nurse initiate interventions:

   4.1 Communication

   All people seeking emergency care require information regarding:

   - The triage process including how they have been classified;
   - Patient flow through the emergency department (eg: when it is your turn you will be called into a cubicle, change into a gown, be assessed by a nurse, then see a doctor);
   - Information regarding potential management as appropriate (eg: tendon laceration likely need for operation so will need to fast until patient is seen by a doctor);
   - Regulations regarding visitors (if any).

   4.2 Evaluation

   - All people who exceed their treatment acuity in the waiting area must have a documented reassessment by the triage nurse.
   - Anyone who is observed to have deteriorated in the waiting area requires immediate reassessment and intervention. This includes people experiencing any of the following: airway problems eg; stridor, breathing problems eg; dyspnoea/ tachypnoea, circulation problems eg; tachycardia/bradycardia, or an alteration of conscious state, or who is experiencing severe or increasing pain.

   4.3. Interventions

   Nurse initiated interventions at triage must:

   - Only be conducted with the patient or carers permission
   - Ensure an appropriate level of privacy for the patient
   - Not delay medical assessment
   - Be clearly explained to the patient
   - Be documented
   - Be in accordance with institutional guidelines for nurse initiated practice.

   <u>Examples of nurse initiated interventions to expedite care at triage</u>

   - First aid (BLS, splinting, RICE, eye irrigation)
   - Urinalysis
   - Facilitating referral to related services (in accordance with hospital guidelines)
   - Weight
   - Simple analgesia
   - Oxygen therapy
   - X-ray (in accordance with hospital guidelines)
   - POP checks (in accordance with hospital guidelines)

(vi) Demonstrate an understanding of institutional and community resources:

Aboriginal Services

Aged and Disability Services

Alcohol and Drug Related Services

- Al Anon - alcohol and drug counselling for young people
- Alcohol and Drug Counselling care and support
- Families of drug and alcohol abusers – counselling service
- Hepatitis C help line
- Lifeline - counselling for substance abuse
- Methadone programme
- Narcotics anonymous help line
- 24 hr counselling: crisis line for drug and alcohol withdrawal

Child Abuse & Neglect

- Children's Home & Family Services
- Child protection Crisis line
- Child Protection Services
- Gatehouse Centre (Royal children's Hospital)
- Child and Adolescent Psychiatric Service
- Parents anon
- Specialist Children's Services

Community Health Centres

Disease Help / Support groups

- Asthma Epilepsy
- Cancer
- Cerebral Palsy
- Other

Emergency Accommodation

Language Link – Telephone Interpreting Service

Psychiatric Services

Help lines

- Child protection Crisis Line
- Drug and Alcohol 24 hr crisis line
- Hepatitis C
- Life line
- Narcotics anonymous
- Parents anon
- Sexual assault
- Vietnam veterans

Pregnancy Support / Family Planning

- Family Planning Victoria
- Fertility control Clinic
- Pregnancy Support 24 hr telephone counselling

Sexual Assault

- CASA
- Community Policing Squad
- Rape Crisis Centre

Sexually Transmitted Diseases

- Action centre advice on STD's and HIV
- Hepatitis C help line
- HIV centres
- HIV support groups

Support groups

- Alcoholics anonymous
- Narcotics anonymous

Victims Assistance Program

(vii) Identify avoidable hazards:

Aspects should include:

Patient Safety:

Prevention of falls;

Provision of appropriate equipment;

Rapid identification of deterioration of patients;

Identify threatening behaviour by other patients, relatives, etc;

Identify potential weapons:

on persons,

in triage area ie. objects that could be thrown.

Triage Nurse:

Recognise and manage violent and aggressive behaviour appropriately;

Training and education in aggression / conflict management;

Demonstrate knowledge of security procedures:

code black, duress alarms, security personnel, locking doors, police;

Lifting and patient movement:

appropriate equipment available.

Environmental:

Identify toxic substances, hazardous chemicals, blood;

Provision of eye wear, gloves, gowns, hand washing facilities;

Identify obstacles to rapid patient movement:

Wheelchairs, trolleys blocking doorways etc.

Appendix 5: Practice Triage Scenarios

Adult Scenario 1

Twenty-three year old female presents with one-day history of PV bleeding. She is able to walk to the triage desk unassisted. She states she is eight weeks pregnant and has had "spotting" since this morning. She described her PV loss as a "few bright spots".

Her respiratory rate is 16 with no use of accessory muscles and her oxygen saturation is 98%

Her heart rate is 78 and her skin is pink, warm and dry

Her blood pressure is 120/80

She has changed her pad once today

Her GCS is 15

She does not complain of any pain

She has no relevant past medical history.

What triage category would you allocate to this patient?

Adult Scenario 2

Eighty-two year old female presents with her daughter following a collapse at home. She is unable to walk and requires assistance to get out of the car. She is brought to the triage desk in a wheelchair. The patient's daughter tells you that her mother has been feeling unwell for 2 days and was nauseated with vomiting today. She collapsed in the lounge room as she got up from a chair and was unconscious for 1 - 2 minutes.

Her respiratory rate is 20 with no use of accessory muscles and her oxygen saturation is 97%

Her heart rate is 148 (irregular), and her skin is pale, cool and moist

Her blood pressure is $^{90}/_{55}$

Her GCS is 13 (eyes open to speech, confused to place and time)

She has no complaints of pain but states she feels dizzy

Her temperature is 37.4

She has a history of ischaemic heart disease, non-insulin dependent diabetes and congestive cardiac failure. Her daughter has brought her medications with her and she takes Daonil, Digoxin, Warfarin, Frusemide and Slow K potassium supplement. She has had all of her usual medications today.

What triage category would you allocate to this patient?

Adult Scenario 3

Seventy-eight year old female presents with her daughter who reports a three-day history of increasing shortness of breath, fevers and lethargy. The patient is able to walk to the triage desk unassisted.

Her respiratory rate is 28 with mild use of accessory muscles, she is able to speak in full sentences and her oxygen saturation on room air is 92%

Her heart rate is 120 (irregular) and her skin is pink, hot and dry

Her blood pressure is $^{145}/_{90}$

Her GCS is 14 (confused to time and place)

She is complaining of right sided back pain 6/10 that is present only on deep inspiration and coughing

Her temperature is 38.5

She describes a productive cough with green sputum. She has a past history of non-insulin dependent diabetes for which she takes Daonil.

What triage category would you allocate to this patient?

Adult Scenario 4

Thirty-five year old female presents by ambulance with one-day history of increasing respiratory distress. On arrival she is sitting upright on the ambulance trolley with nebulised Salbutamol in progress.

Her respiratory rate is 36 with severe use of accessory muscles, she is unable to speak and her oxygen saturation is 88%

Her heart rate is 135 (regular) and her skin is pale, cold and moist

Her blood pressure is $^{140}/_{85}$

Her GCS is 14 (eye opening to speech)

Her temperature is 37.8

She has a past history of asthma.

What triage category would you allocate to this patient?

Adult Scenario 5

Fifty-year-old male presents with a workmate with a laceration for his right hand. He is able to walk to the triage desk unassisted. He was using an electric saw and has a 4cm laceration to his right index finger.

His respiratory rate is 22 with no use of accessory muscles and his oxygen saturation is 99%

His heart rate is 68 (regular), and his skin is pale, warm and dry

His blood pressure is 135/85

His GCS is 15

He is complaining of pain in his finger 3/10

He is unable to move his right index finger and complains of altered sensation to the finger tip

His laceration is not bleeding

His temperature is 36.5

He has no relevant past medical history.

What triage category would you allocate to this patient?

Adult Scenario 6

Thirty-year-old female presents with a one-day history of vomiting, diarrhoea and abdominal pain. She is able to walk to the triage desk unassisted and she states that her symptoms were of sudden onset.

Her respiratory rate is 16 with no use of accessory muscles and her oxygen saturation is 98%

Her heart rate is 88 and her skin is pale, warm and dry

Her blood pressure is 110/85

Her GCS is 15

She is complaining of generalised abdominal pain 4/10

She states that she has not vomited for 4 hours but continues to have diarrhoea. She is tolerating small amounts of oral fluid. She has a past history of asthma for which she uses a Ventolin puffer.

What triage category would you allocate to this patient?

Adult Scenario 7

Sixty-eight year old male presents by ambulance following collapse at the shopping centre. On arrival he is in a semi-recumbent position on the ambulance trolley. His wife tells you that he became pale, complained of feeling dizzy and then fell to the ground. His wife states that he was unconscious for "a few seconds".

His respiratory rate is 16 with no use of accessory muscles, he is able to speak in full sentences and his oxygen saturation on room air is 96%

His heart rate is 56 (irregular) and his skin is pale, warm and dry

His blood pressure is 140/85

His GCS is 13 (eyes open to speech and confused to time and place)

He has no complaints of pain

His temperature is 37.8

He tells you that he did not have any chest pain or headache prior to his collapse. He has a past history of COAD and a "cardiac complaint". His medications are Digoxin, Frusemide, Potassium supplements and the occasional Anginine.

What triage category would you allocate to this patient?

Adult Scenario 8

Fifty-three year old male presents by ambulance with sudden onset of crushing central chest pain 3 hours ago. He got pain whilst he was chopping down a tree in his garden. On arrival he is in a semi-recumbent position on the ambulance trolley.

His respiratory rate is 18 with no use of accessory muscles and his oxygen saturation is 99%

His heart rate is 68 (regular), and his skin is pale, cool and moist

His blood pressure is 135/75

His GCS is 15

He is complaining of crushing central chest pain 9/10 with no radiation

His temperature is 36.6

He has no relevant past medical history.

What triage category would you allocate to this patient?

Adult Scenario 9

Forty-eight year old male presents alone complaining of a red and watery right eye. He is able to walk to the triage desk unassisted. He states that he was stripping wallpaper yesterday and spent most of the day working in plaster dust.

His respiratory rate is 16 with no use of accessory muscles and his oxygen saturation is 98%

His heart rate is 72 and his skin is pink, warm and dry

His blood pressure is 130/70

His eye is red and slightly watery, he has normal vision

His GCS is 15

He is not complaining of any pain

He has no relevant past medical history.

What triage category would you allocate to this patient?

Adult Scenario 10

Forty-five year old female presents with a friend complaining of a frontal headache. She is unable to walk to the triage desk and arrives in a wheelchair being pushed by her friend. She tells you that the headache has been of gradual onset for the last twelve hours and complains of associated vomiting and visual disturbance. She states that her headache is typical of her usual migraines. She has had two Panadiene Forte three hours ago.

Her respiratory rate is 24 with no use of accessory muscles and her oxygen saturation is 97%

Her heart rate is 102 (regular), and her skin is pale, cool and dry

Her blood pressure is 125/80

Her GCS is 15

She is complaining of a frontal headache 5/10 with no radiation

Her temperature is 36.8

She has a history of migraine and depression for which she takes antidepressants.

What triage category would you allocate to this patient?

Adult Scenario 11

Twenty-one year old female presents by ambulance following a motorcar accident. She was the driver of a car that struck the rear of a parked truck at 80 kph. On arrival she is in a supine position on a spinal board on the ambulance trolley. She has a haematoma to the left side of her forehead and an obvious seatbelt mark across her chest and abdomen. She has a cervical collar insitu and oxygen at 10 L/minute via a Hudson mask.

Her respiratory rate is 32 with no use of accessory muscles, and her oxygen saturation is 94%

Her heart rate is 142 (regular) and her skin is pale, cold and moist

Her blood pressure is 100/60

Her GCS is 7 (eye opening to pain, no verbal response, withdrawal to pain)

Her temperature is 36.2

She has no relevant medical past history.

What triage category would you allocate to this patient?

Adult Scenario 12

Seventy- year old female presents with her daughter who reports a three-day history of increasing confusion and urinary incontinence. The patient is able to walk to the triage desk unassisted.

Her respiratory rate is 18 with no use of accessory muscles, she is able to speak in full sentences and her oxygen saturation on room air is 98%

Her heart rate is 84 (regular) and her skin is pink, warm and dry

Her blood pressure is 115/80

Her GCS is 14 (confused to time and place)

She is not complaining of any pain

Her temperature is 37.9

She has a past history of rheumatoid arthritis for which she takes Voltaren.

What triage category would you allocate to this patient?

Adult Scenario 13

Twenty-six year old male presents with his wife complaining of sudden onset of abdominal pain. He is able to walk slowly to the triage desk but requires assistance from his wife. He has had pain for 12 hours but it has become much worse in the last 2 hours. He has vomited once and had two episodes of diarrhoea. He has not eaten today.

His respiratory rate is 24 with no use of accessory muscles and his oxygen saturation is 99%

His heart rate is 98 (regular), and his skin is pale, cool and dry

His blood pressure is 100/75

His GCS is 15

He is complaining of right sided abdominal pain 6/10 with no radiation

His temperature is 37.8

He has no relevant past medical history.

What triage category would you allocate to this patient?

Adult Scenario 14

Fifty-seven year old female presents with a friend following an injury to her right wrist. She is able to walk to the triage desk unassisted and has a sling on her right arm. She states she injured her wrist when she tripped on uneven ground in her front yard. Her friend witnessed the fall and she had no loss of consciousness.

Her respiratory rate is 20 with no use of accessory muscles and her oxygen saturation is 98%

Her heart rate is 78 and her skin is pale, warm and dry

Her blood pressure is 145/85

Her GCS is 15

She is complaining of a painful right wrist 3/10

Her right wrist is deformed and the neurovascular status of the right hand is normal

She has a past history of a left CVA two years ago resulting in a mild right hemiparesis and right facial droop. Her only medication is Aspirin.

What triage category would you allocate to this patient?

Paediatric Scenario 1

Four-year-old male presents with his parents with a laceration to his top lip. He is able to walk to the triage desk holding onto his mother's hand. His mother tells you he collided with another child at playgroup. The childcare worker witnessed the event and there was no loss of consciousness.

His respiratory rate is 20 with no use of accessory muscles, he is speaking in sentences and his oxygen saturation is 98%

His heart rate is 86 and his skin is pink, warm and dry

His laceration is 2 - 3 cm in length with swelling around the laceration, it has a slow trickle of blood and the edges are jagged

He is alert but clinging to his mothers leg and he is crying but consolable by his mother

He complains of pain in his top lip and cries when you place a dressing over the laceration

His temperature is 37.1

He has a past medical history of recurrent tonsillitis.

What triage category would you allocate to this patient?

Paediatric Scenario 2

Nine-year-old female presents with her mother with a painful left forearm. Her mother states she was roller-blading in the backyard when she fell. The patient is able to walk to the triage desk unassisted and is holding her left arm.

Her respiratory rate is 16 with no use of accessory muscles, she is able to speak in full sentences and her oxygen saturation on room air is 99%

Her heart rate is 90 (regular) and her skin is pink, warm and dry

Her GCS is 15

She is complaining of a painful left forearm and indicates that her pain equates to 6/10 on a pain scale

Her arm is slightly deformed with decreased range of movement, and the neurovascular status of her left hand is normal

Her temperature is 36.5

She has no relevant past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 3

Four-year-old male presents with his parents with a one-day history of increasing respiratory distress. His father carries him to the triage desk. His parent state that he has had a dry barking cough for two days and was coughing most of the night.

He has an audible stridor

His respiratory rate is 68 with severe use of accessory muscles, he is unable to speak and his oxygen saturation is 96%

His heart rate is 178 (regular) and his skin is pale, cold and moist

His tongue and mucous membranes are moist

He is drowsy but responsive to verbal stimuli

His temperature is 38.6

He has no relevant medical past history.

What triage category would you allocate to this patient?

Paediatric Scenario 4

Eighteen-month-old male presents with his father with a laceration to the back of his head. He is able to walk to the triage desk holding his father's hand. His father states that he was hit in the head when an older sibling threw a toy at him. The patient's father witnessed the incident and there was no loss of consciousness.

His respiratory rate is 20 with no use of accessory muscles and his oxygen saturation is 98%

His heart rate is 96 and his skin is pink, warm and dry

His laceration is 2 cm in length, is not bleeding and the edges are well approximated

He is alert and chasing his older sibling around the waiting room

He is not complaining of any pain

He has no relevant past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 5

Eight-month-old male presents with his parents with a one-day history of febrile illness and cough. His mother carries him to the triage desk. He has a moist sounding cough and a runny nose.

His respiratory rate is 24 with no use of accessory muscles, he is making "baby talk" noises and his oxygen saturation is 98%

His heart rate is 112 and his skin is pink, warm and dry

He is alert but cries when you approach him

His tongue and mucous membranes are moist

His temperature is 38.4

He has no past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 6

Four-year-old female presents with her parents following a one-day history of febrile illness and witnessed generalised (tonic - clonic) seizure. Her mother carries her to the triage desk. Her mother states has had "fevers all day" and had a "fit" about thirty minutes ago. Her mother states that the seizure lasted two - three minutes and resolved spontaneously. The patient was unresponsive during the seizure but did not change colour and did not injure herself.

Her respiratory rate is 22 with no use of accessory muscles, she cries when you approach her and her oxygen saturation is 99%

Her heart rate is 132 (regular), and her skin is pink, hot and dry

Her tongue and mucous membranes are moist

She opens her eyes to speech and is irritable but consolable by her mother

Her mother states she has complained of a sore throat last night and has been complaining of a "sore head" since her fit

Her temperature is 39.0

She has a past medical history of febrile convulsions.

What triage category would you allocate to this patient?

Paediatric Scenario 7

Two-year-old male presents with his parents following a fall from the kitchen table. His mother carries him to triage desk. His parents state that he had climbed up onto the table and was standing on the table when he fell landing on a wooden floor. His mother witnessed the fall and states there was loss of consciousness for a "few minutes". He has been unable to walk and has vomited three times since the fall.

His respiratory rate is 28 with no use of accessory muscles, he is not speaking but cries intermittently and his oxygen saturation is 96%

His heart rate is 140 (regular), and his skin is pale, cool and moist

His tongue and mucous membranes are moist

He is responsive to painful stimuli

He is unable to verbalise where is pain is but is holding his head and crying inconsolably

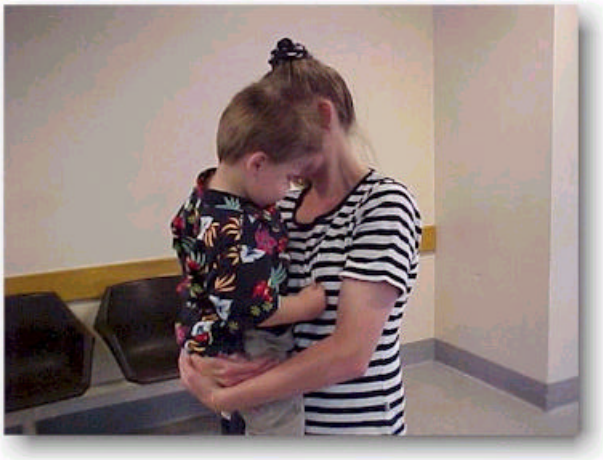
He has a palpable haematoma to the right side of his head

His temperature is 36.4

He has no relevant past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 8



Three-year-old male presents with his parents with a three-day history of vomiting and diarrhoea. His mother carries him to the triage desk. His mother states he still has diarrhoea but is tolerating small amounts of oral fluid. His mother states that he has not vomited today. His mother is unable to tell you about the number of wet nappies as he has had 8 episodes of watery diarrhoea today.

His respiratory rate is 28 with no use of accessory muscles, he cries when you approach him and his oxygen saturation is 99%

His heart rate is 124 (regular), and his skin is pale, warm and dry

His tongue and mucous membranes are dry

He is crying intermittently but is consolable by her mother and is asking for a drink

He opens his eyes to speech

His mother states that he is complaining of abdominal pain

His temperature is 37.8

He has no past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 9

Six-month-old male presents with his parents with a one-day history of febrile illness and cough. His mother carries him to the triage desk. He has a moist sounding cough and a runny nose.

His respiratory rate is 24 with no use of accessory muscles, he is making "baby talk" noises and his oxygen saturation is 98%

His heart rate is 112 and his skin is pink, warm and dry

He is alert but cries when you approach him

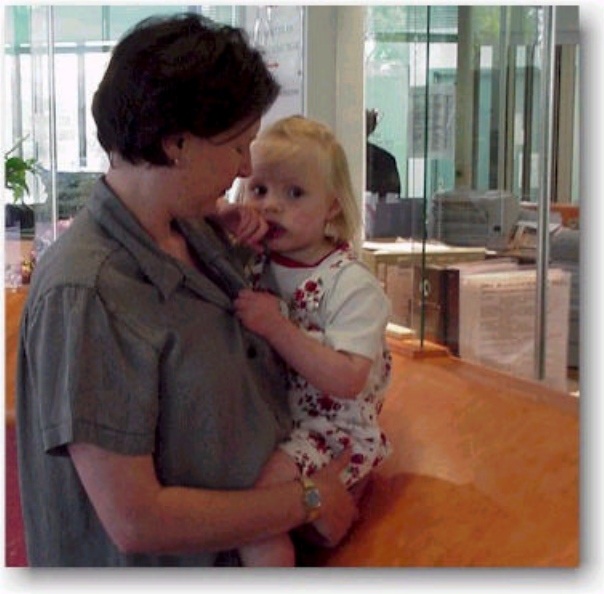
His tongue and mucous membranes are moist

His temperature is 38.4

He has no past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 10



Thirteen-month-old female presents with her parents with a one-day history of diarrhoea. Her mother carries her to the triage desk. Her mother states that she thinks that the number of wet nappies is close to normal but is not sure, as the child has had 7 episodes of diarrhoea today. Her mother states that over the last day she has had approximately three-quarters of her usual amount of fluid and has been unsettled.

Her respiratory rate is 22 with no use of accessory muscles and her oxygen saturation is 99%

Her heart rate is 92 and her skin is pink, warm and dry

She is alert and cries when you approach her

Her tongue and mucous membranes are moist

Her temperature is 38.2

She has no relevant past history.

What triage category would you allocate to this patient?

Paediatric Scenario 11

Three-year-old male presents with his aunt with a painful left ear. He is able to walk to the triage desk unassisted. His aunt states that the patient is staying with her whilst his parents are away for the weekend and that he was unable to sleep last night because of an earache in his left ear. His aunt requests that someone "check him out".

His respiratory rate is 16 with no use of accessory muscles and his oxygen saturation is 98%

His heart rate is 88 and his skin is pink, warm and dry

He is alert

She states his ear is not painful now and he has not had anything for the earache

His temperature is 37.6

He has no relevant past medical history.

What triage category would you allocate to this patient?

Paediatric Scenario 12

Ten-year-old male presents by ambulance with respiratory distress, accompanied by a schoolteacher. He states that his asthma became "bad" while he was playing school sports. He is sitting upright on the ambulance trolley with a nebulised Salbutamol in progress.

His respiratory rate is 48 with moderate use of accessory muscles, he is speaking in short phrases and his oxygen saturation is 92%

His heart rate is 130 (regular), and his skin is pink, warm and dry

His tongue and mucous membranes are moist

His GCS is 14 (eyes open to speech)

He has no complaints of pain

His temperature is 37.8

He has a history of asthma for which he occasionally uses a Ventolin puffer.

What triage category would you allocate to this patient?

Paediatric Scenario 13

Twenty-month-old female presents by ambulance with a generalised (tonic - clonic) seizure. She has a one-day history of a febrile illness. On arrival she is still fitting and is in a lateral position on the ambulance trolley with oxygen at 8 L/minute via a Hudson mask.

Her respiratory rate is unable to be measured and her oxygen saturation is 90%

Her heart rate is 154 (regular) and her skin is pale, warm and dry with cyanosis of the lip margins

Her tongue and mucous membranes are moist

She is unresponsive as she is fitting

Her temperature is 38.8

She has a past history of a febrile convulsion 6 months ago.

What triage category would you allocate to this patient?

Paediatric Scenario 14

Six-year-old female presents with her mother with a three-day history of febrile illness, respiratory distress and wheeze. Her mother carries her to the triage desk. Her mother states that she has asthma and has had increasing use of her Ventolin puffer over the last few days but with poor effect. Today she has been using her Ventolin puffer with a spacer two hourly.

Her respiratory rate is 28 with mild use of accessory muscles, she is able to speak in full sentences and her oxygen saturation on room air is 99%

Her heart rate is 110 (regular) and her skin is pale, warm and dry

Her GCS is 15

Her mother state she has had no complaints of pain

Her temperature is 38.5

Her only past medical history is asthma for which she uses a Ventolin puffer.

What triage category would you allocate to this patient?

Appendix 6: Answers to Practice Triage Scenarios

Adult Scenario 1: **ATS Category 5**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 16, no use accessory muscles, SaO_2 96%
Circulation	No haemodynamic compromise
	HR 78, skin pink, warm and dry, BP $^{120}/_{80}$, has used one pad today
Disability	GCS 15
	No pain
Risk Factors	Nil

Adult Scenario 2: **ATS Category 2**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 20, no use accessory muscles, SaO_2 97%
Circulation	Moderate haemodynamic compromise
	HR 148, skin pale, cool, moist, BP $^{90}/_{55}$,
Disability	GCS 13
	No pain
Risk Factors	Age 82 yrs
	Hx collapse with unconsciousness
	PHx cardiovascular disease, NIDDM

Adult Scenario 3: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	Mild respiratory distress
	c/o SOB, RR 28, mild use accessory muscles, speaking in sentences, SaO_2 92%
Circulation	Mild haemodynamic compromise
	HR 120, skin pink, hot and dry, BP $^{145}/_{80}$
Disability	GCS 14
	c/o R) back pain 6/10
Risk Factors	Age 78 yrs
	T - 38.5
	PHx NIDDM

Adult Scenario 4: **ATS Category 1**

Airway	Patent - no airway compromise
Breathing	Severe respiratory distress
	RR 36, severe use accessory muscles, unable to speak, SaO_2 88% on O_2
Circulation	Moderate haemodynamic compromise
	HR 135, skin pale, cold and moist, BP $^{140}/_{85}$,
Disability	GCS 14
	No pain
Risk Factors	PHx asthma

Adult Scenario 5: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 22, no use accessory muscles, SaO_2 99%
Circulation	No haemodynamic compromise
	HR 68, skin pale, warm and dry, BP $^{135}/_{85}$,
Disability	GCS 15
	c/o finger pain 3/10
	No neurovascular compromise but altered movement and sensation to finger
Risk Factors	Nil

Adult Scenario 6: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 16, no use accessory muscles, SaO_2 99% 8
Circulation	No haemodynamic compromise
	HR 88, skin pale, warm and dry, BP $^{110}/_{85}$, continued diarrhoea but tolerating oral fluids
Disability	GCS 15
	c/o abdominal pain 4/10
Risk Factors	Nil

Adult Scenario 7: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 16, no use accessory muscles, speaking in full sentences, SaO_2 96%
Circulation	Mild haemodynamic compromise
	HR 58, skin pale, warm and dry, BP $^{140}/_{85}$,
Disability	GCS 13
	No pain
Risk Factors	Age 68yrs
	Hx collapse with unconsciousness
	PHx respiratory disease, cardiovascular disease

Adult Scenario 8: **ATS Category 2**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 18, no use accessory muscles, SaO_2 99%
Circulation	No haemodynamic compromise
	HR 68, skin pink, warm and dry, BP $^{135}/_{75}$,
Disability	GCS 15
	c/o crushing central chest pain 9 /10
Risk Factors	53 year old male
	Sudden onset chest pain on exertion - unrelieved for 3 hours

Adult Scenario 9: **ATS Category 5**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 16, no use accessory muscles, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 72, skin pink, warm and dry, BP $^{130}/_{70}$,
Disability	GCS 15
	No pain
Ophthalmic	R) eye red and watery
	Normal vision
	No pain
Risk Factors	Nil

Adult Scenario 10: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 24, no use accessory muscles, SaO_2 97%
Circulation	Mild haemodynamic compromise
	HR 102, skin pale, cool and dry, BP $^{125}/_{80}$
Disability	GCS 15
	c/o frontal headache 5/10
Risk Factors	Frontal headache
	associated vomiting and visual disturbance
	unrelieved by Panadiene Forte

Adult Scenario 11: **ATS Category 1**

Airway	No verbal response
	GCS 7
Breathing	Moderate - severe respiratory distress
	RR 32, no use accessory muscles, SaO_2 94% on 10 L/min O_2
Circulation	Severe haemodynamic compromise
	HR 142, skin pale, cold and moist, BP $^{100}/_{60}$
Disability	GCS 7
	Unable to assess pain
Risk Factors	Mechanism of injury - high impact MCA
	Haematoma to forehead, seatbelt mark to chest and abdomen

Adult Scenario 12: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 18, no use accessory muscles, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 84, skin pink, warm and dry, BP $^{115}/_{80}$
Disability	GCS 14 - increasing confusion for three days
	No pain
Risk Factors	78 years old

Adult Scenario 13: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 24, no use accessory muscles, SaO_2 99%
Circulation	Mild haemodynamic compromise
	HR 98, skin pale, cool and dry, BP $^{100}/_{75}$
Disability	GCS 15
	c/o abdominal pain 6 / 10
Risk Factors	Nil

Adult Scenario 14: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 20, no use accessory muscles, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 78, skin pink, warm and dry, BP $^{145}/_{85}$
Disability	GCS 15
	c/o wrist pain 3/10
	no neurovascular compromise
Risk Factors	Nil

Paediatric Scenario 1: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 20, no use accessory muscles, speaking in full sentences, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 86, skin pink, warm and dry, 2-3 cm laceration, slow trickle of blood
Disability	GCS 15
	Normal activity - clinging to mothers leg, alert, consolable by mother
	c/o lip pain, cries when dressing applied
Risk Factors	Nil

Paediatric Scenario 2: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 16, no use accessory muscles, speaking in full sentences, SaO_2 99%
Circulation	No haemodynamic compromise
	HR 90, skin pink, warm and dry
Disability	GCS 15
	c/o painful L) forearm 6/10
	No neurovascular compromise but decreased movement
Risk Factors	Nil

Paediatric Scenario 3: **ATS Category 1**

Airway	Partial obstruction - audible stridor
Breathing	Severe respiratory distress
	RR 68, severe use accessory muscles, unable to speak , SaO_2 96%
Circulation	Severe haemodynamic compromise
	HR 178, skin pale, cold, moist
Disability	GCS < 14
	Decreased activity - drowsy, responsive to verbal stimuli
Risk Factors	Nil

Paediatric Scenario 4: **ATS Category 5**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 20, no use accessory muscles, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 96, skin pink, warm and dry, 2cm laceration, not bleeding
Disability	GCS 15
	Normal activity - alert, chasing older sibling
	No pain
Risk Factors	Nil

Paediatric Scenario 5: ATS Category 4

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 24, no use accessory muscles, making 'baby talk' noises, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 112, skin pink, warm and dry, moist tongue & mucous membranes
Disability	GCS 15
	Normal activity - alert, cries when approached
Risk Factors	Nil

Paediatric Scenario 6: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 24, no use accessory muscles, SaO_2 99%
Circulation	Mild haemodynamic compromise
	HR 132, skin pink, hot and dry, moist tongue & mucous membranes
Disability	GCS 13
	Eyes open to speech, irritable but consolable
	Normal activity - alert, cries when approached
	c/o "sore" head
Risk Factors	Hx generalised seizure

Paediatric Scenario 7: **ATS Category 2**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 28, no use accessory muscles, cries intermittently, SaO_2 96%
Circulation	Moderate haemodynamic compromise
	HR 140, skin pale, cool, moist, moist tongue & mucous membranes
Disability	GCS 13
	Inconsolable
	? pain- is holding head, palpable haematoma to R) side of head
Risk Factors	Mechanism of injury - fall from standing on table, landed on wooden floor
	Hx loss of consciousness, unable to walk and vomiting since injury

Paediatric Scenario 8: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	Mild respiratory distress
	RR 28, no use accessory muscles, cries, SaO_2 99%
Circulation	Mild haemodynamic compromise
	HR 124, skin pale, warm and dry, ongoing diarrhoea but no vomiting, tolerating small amounts of oral fluid, dry tongue & mucous membranes
Disability	GCS 14
	Normal activity - asking for a drink
	Cries when approached but consolable by mother
Risk Factors	Nil

Paediatric Scenario 9: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 24, no use accessory muscles, “baby talking”, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 112, skin pink, warm and dry, moist tongue and mucous membranes
Disability	GCS 15
	Normal activity - carried by mother, alert, cries when approached
Risk Factors	Nil

Paediatric Scenario 10: **ATS Category 4**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 22, no use accessory muscles, speaking in full sentences, SaO_2 99%
Circulation	No haemodynamic compromise
	HR 92, skin pink, warm and dry, moist tongue and mucous membranes, reduced oral intake, ongoing diarrhoea
Disability	GCS 15
	Normal activity - carried by mother, alert, cries when approached
Risk Factors	Nil

Paediatric Scenario 11 **ATS Category 5**

Airway	Patent - no airway compromise
Breathing	No respiratory distress
	RR 16, no use accessory muscles, speaking, SaO_2 98%
Circulation	No haemodynamic compromise
	HR 88, skin pink, warm and dry
Disability	GCS 15
	Normal activity - alert
	No pain
Risk Factors	Nil

Paediatric Scenario 12: **ATS Category 2**

Airway	Patent - no airway compromise
Breathing	Moderate respiratory distress
	RR 48, moderate use accessory muscles, speaking in short phrases, SaO_2 92% on O_2
Circulation	Mild haemodynamic compromise
	HR 130, skin pink, warm and dry
Disability	GCS 14
	No pain
Risk Factors	Nil

Paediatric Scenario 13: **ATS Category 1**

Airway	Fitting - unable to maintain airway
Breathing	Severe respiratory distress
	Fitting - no respiratory effort, SaO_2 90% on O_2, cyanosed lip margins
Circulation	Severe haemodynamic compromise
	HR 154, skin pale, warm and dry, moist tongue and mucous membranes
Disability	GCS 3
Risk Factors	Uncontrolled fitting

Paediatric Scenario 14: **ATS Category 3**

Airway	Patent - no airway compromise
Breathing	Mild respiratory distress
	RR 28, mild use accessory muscles, speaking in full sentences, SaO_2 99%
Circulation	Mild haemodynamic compromise
	HR 110, skin pale, warm and dry
Disability	GCS 15
	No pain
Risk Factors	Asthma - increased Ventolin use with poor effect, today using Ventolin 2 hourly and still short of breath on arrival to ED