Charity reg. No. 228636

National Audit of Violence

Module 3b – Case note/Drug chart audit: the use of rapid tranquillisation

National Report: Working age adult services

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Background

The questions within the audit tool are based upon the rapid tranquillisation section of the NICE Guideline: Violence – the short term management of disturbed/violent in in-patient psychiatric settings and emergency departments (2005) and its associated algorithm. As the scope for the guideline specifically excluded services for people with dementia, the audit tool for 'older people's services' is briefer than the 'working age adults' equivalent. The results for 'older peoples services' will be reported separately.

Key findings from national results

The sampling methods for the audit, the relatively small number cases audited, and the often high levels of missing data mean that the national results have to be interpreted with caution. However, the data would seem to indicate the following:

- On the whole, the right class of drugs (individual or combinations) are being used for the right situations (psychosis or non-psychosis), and within safe dosage limits.

- Post administration monitoring *appears to be* inadequate, although the findings could also reflect the fact that many patients were included who did not have a reduced level of consciousness.

- Lack of monitoring is associated with the absence of an *agreed plan* to monitor.

What happens next?

Local teams are encouraged to review their findings, relative to the national findings and determine whether there is any relevant action required. The Healthcare Commission requires that all participating wards compile and submit an action plan that details the positive improvements that you will be taking forward, based on your local findings from the audit. This action planning is being supported through the Feedback Events.

Methods

Sampling

All wards for adults of working age were encouraged to take part in this part of the audit programme. In recognition of the fact that the levels of usage of rapid tranquillisation varied considerably between subject wards, the sampling and audit methods were suitably flexible[1].

A three-stage process was recommended: firstly, a census week was used to identify potential cases that might be audited; secondly, the audit sample was identified; finally, the case notes were audited against the audit checklist.

1. **Census week:** local project teams were asked to specify one week and, during this week, the Ward Manager was asked to ensure that a numbered list was compiled of all instances where a patient had received rapid tranquillisation. It was suggested that this task could be delegated to another member of the nursing team or the ward clerk, or could be compiled by the team at each handover.

2. **Sampling:** at the end of the week, teams were instructed to work through the numbered list and draw a sample from the odd numbers of a minimum of 5 and a maximum of 15 separate instances[2].

[1] During the Introductory Workshops that preceded data collection, the Audit Team consulted with local teams to determine an appropriate methodology for this module of the audit.

3. **Audit of case notes/drug charts:** the following suggestions were made to local teams about who should carry out the actual audit.

   • a Senior Nurse
   • an SHO or SpR
   • a Pharmacist
   • a member of the Clinical Governance/Clinical Audit Team

Submission of data

Local teams collected their data using a simple template. This data was then entered via a web-link. The data collection period began on 9 October 2006 and continued until 9 March 2007[3].

Data presentation

This report includes **the national findings for services for adults of working age**. Nationally, data was submitted on behalf of the following:

- 54 trusts;
- 95 wards;
- 532 individual incidents.

NOTES

1. **Where the actual number of responses was zero**, Excel was unable to calculate a corresponding percentage and the symbols #DIV/0! will appear, e.g.:

	Yes		No	
	n	%	n	%
Local	0	#DIV/0!	0	#DIV/0!
National	211	97%	7	3%

2. **Percentages are presented without decimal points** (e.g. 56%, rather than 56.4%), resulting in some 'rounding up' of scores, meaning that sometimes total scores will appear to be 99% or 101%.

3. **Good practice** has been highlighted in **green** on the graphs. Areas of concern have been highlighted in **red**.

4. **Only wards who entered the required minimum of 5 cases have received a local report that compares their results with the national figures.**

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[2] If, at the end of the census week, teams had insufficient instances to include in the audit, wards were given two options: continue collecting the list for one (or more) additional weeks; include all instances in the sample.
[3] The original deadline of 28 February 2007 was extended at the request of many of the participating wards.

Glossary of terms

This glossary was adapted from the NICE Guideline, 2005.

Advance directive: a document that contains the instructions of a person with mental health problems setting out their requests in the event of a relapse, an incident of disturbed/violent behaviour etc. It sets out the treatment that they do not want to receive and any treatment preferences that they may have in the event that they become violent. It also contains people who they wish to be contacted and any other personal arrangement that they wish to be made.

Antipsychotics: a class of prescription medications used to treat psychotic conditions.

Benzodiazepines: refers to any of several similar lipophilicamines used as tranquillizers or sedatives or hypnotics or muscle relaxants.

Exceptional circumstances: those circumstances that cannot reasonably be foreseen and as a consequence cannot be planned for.

Parenteral: method of administering medication or nutrition other than via the digestive tract, such as intravenous, subcutaneous or intramuscular.

Patient: the term 'patient' is used, rather than 'service user' in this document and associated audit tools and guidance (except when text is quoted directly from the NICE guideline).

PRN (Prorenata): medication that may be used as the occasion arises; when necessary.

Rapid tranquillisation: the use of medication to calm/lightly sedate the patient, reduce the risk to self and/or others and achieve an optimal reduction in agitation and aggression, thereby allowing a thorough psychiatric evaluation to take place, and allowing comprehension and response to spoken messages throughout the intervention. Although not the overt intention, it is recognised that in attempting to calm/lightly sedate the patient, rapid tranquillisation may lead to deep sedation/anaesthesia.

Section 1: Carrying out rapid tranquillisation

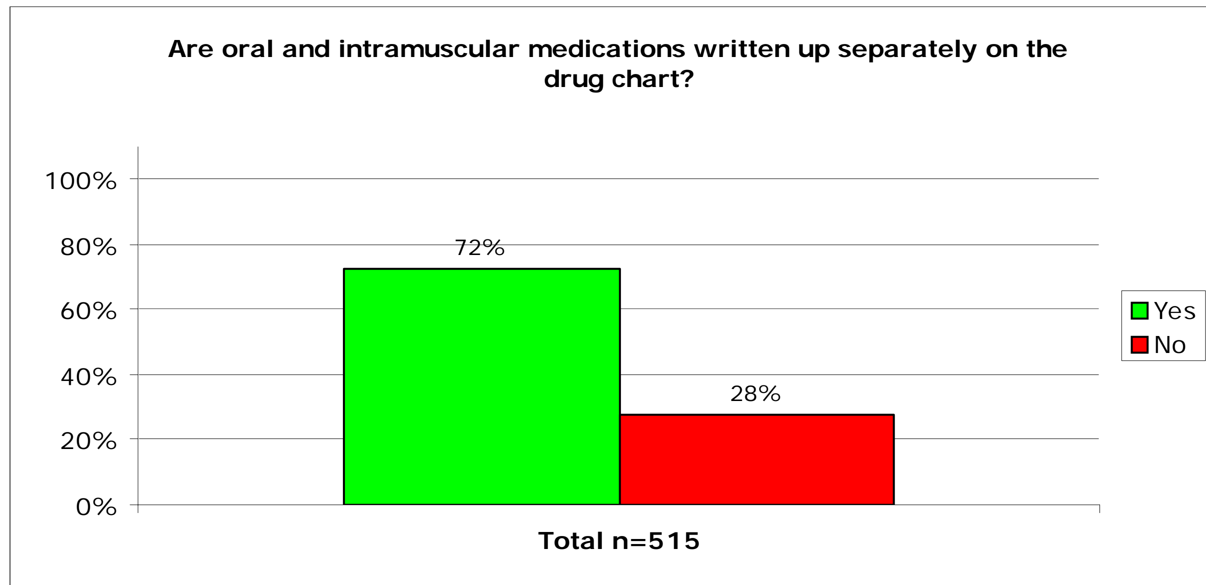
NOTE
This section of the audit was completed by **ALL** respondents. The total number of cases audited by services for adults of working age nationally was 532 (n=532), however, the total national figures in some tables/charts do not add up to the expected number due to missing data.

1.8.4.7 **Guideline recommendation**
Oral medication should be offered before parenteral medication as far as possible.
1.8.4.14 **Guideline recommendation**
If parenteral treatment proves necessary, the intramuscular route is preferred over intravenous from a safety point of view.

Which route of administration was used?

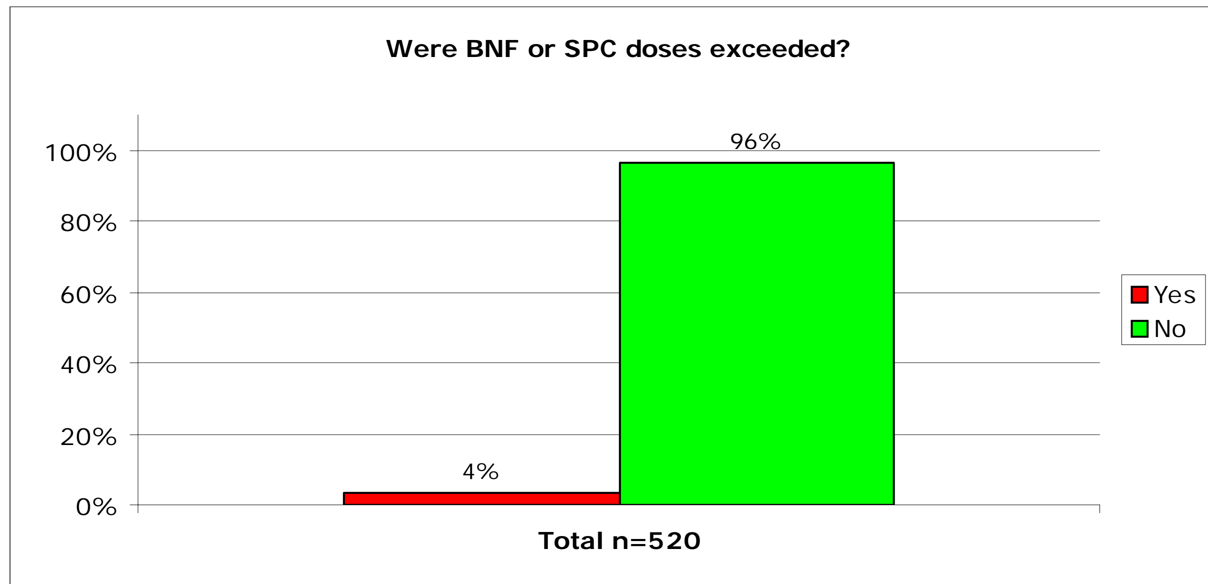
Oral	Intramuscular	Oral/ Intramuscular	Total n
64%	26%	9%	532

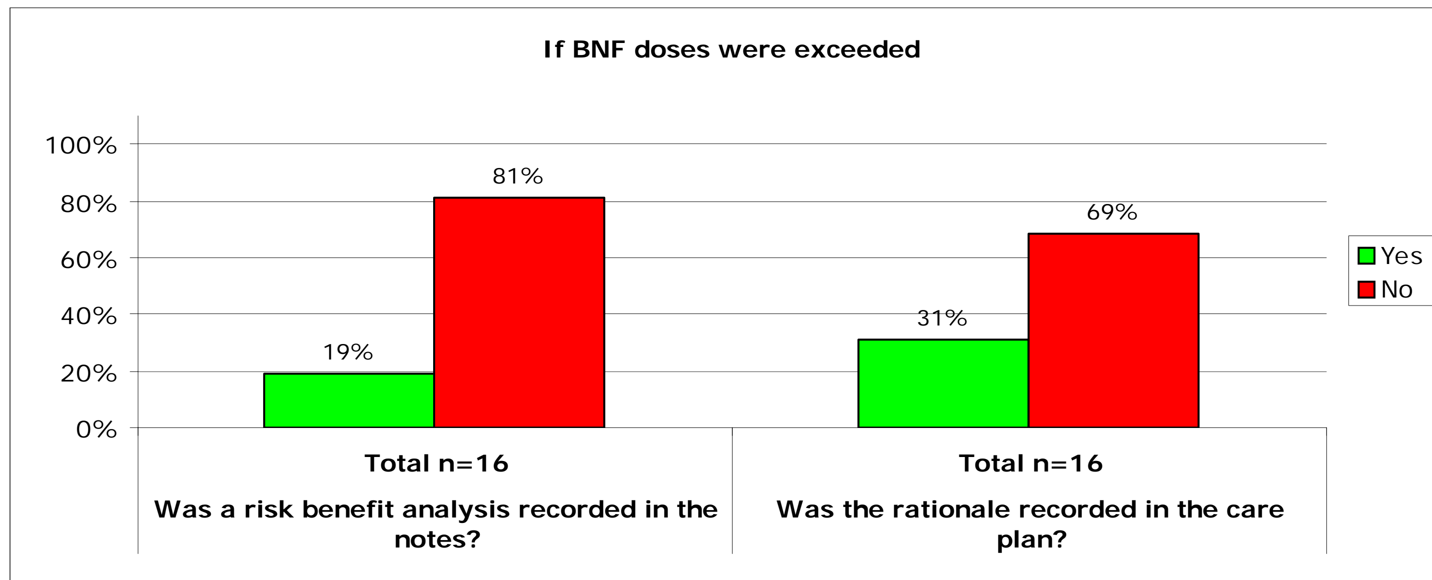
1.8.4.9 **Guideline recommendation**
Oral and intramuscular medications should be prescribed separately and the abbreviation of o/i/m should not be used.



Prescribing levels

1.8.4.28	**Guideline recommendation** *When using rapid tranquillisation there may be certain circumstances in which the current BNF uses and limits and manufacturer's SPC may be knowingly exceeded. A risk–benefit analysis should be recorded in the case notes and a rationale should be recorded in the care plan.*





Section 2: The use of oral medication

NOTE: the respondent group for this section included:

- cases where **ONLY** ORAL RAPID TRANQUILLISATION was administered;
- cases where ORAL **AND** INTRAMUSCULAR RAPID TRANQUILLISATION were administered.

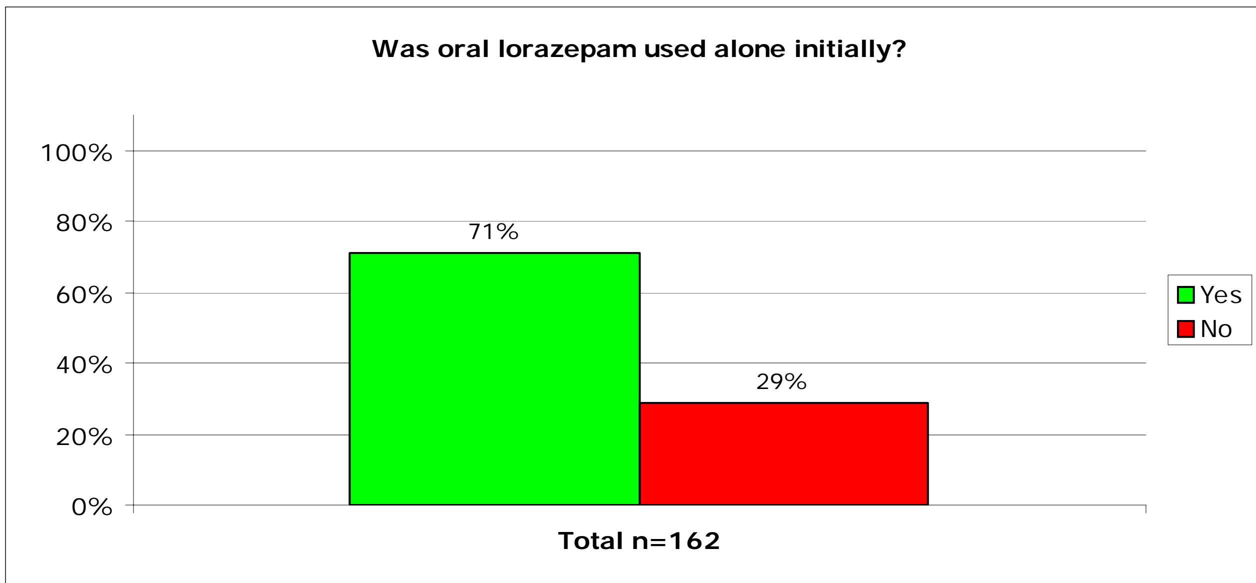
The total number of respondents nationally was 392 (n=392), however, the total national figures in some tables/charts do not add up to the expected number due to missing data.

1.8.4.10 Guideline recommendation

When the behavioural disturbance occurs in a non-psychotic context it is preferable to initially use oral lorazepam alone or intramuscularly if necessary.

Did the behavioural disturbance occur in a non-psychotic context?

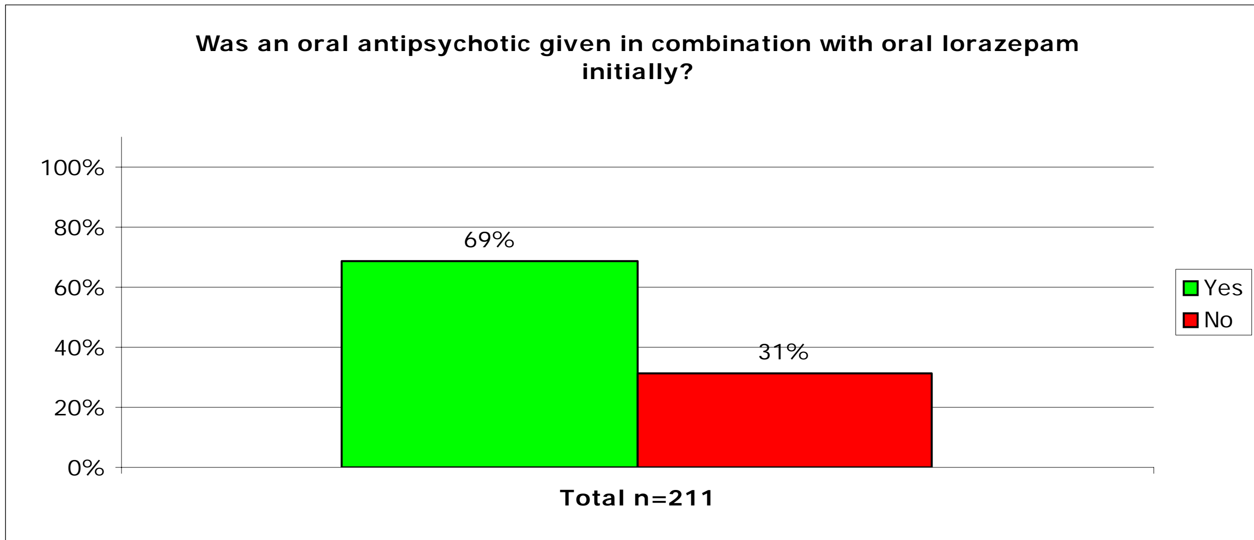
Yes	No	Total n
43%	57%	384



1.8.4.11	**Guideline recommendation** *When the behavioural disturbance occurs <u>in the context of psychosis</u>, to achieve early onset of calming/sedation, or to achieve a lower dose of antipsychotic, an oral antipsychotic in combination with oral lorazepam, should be considered in the first instance (see chart for rapid tranquillisation).*

Did the behavioural disturbance occur in the context of psychosis?

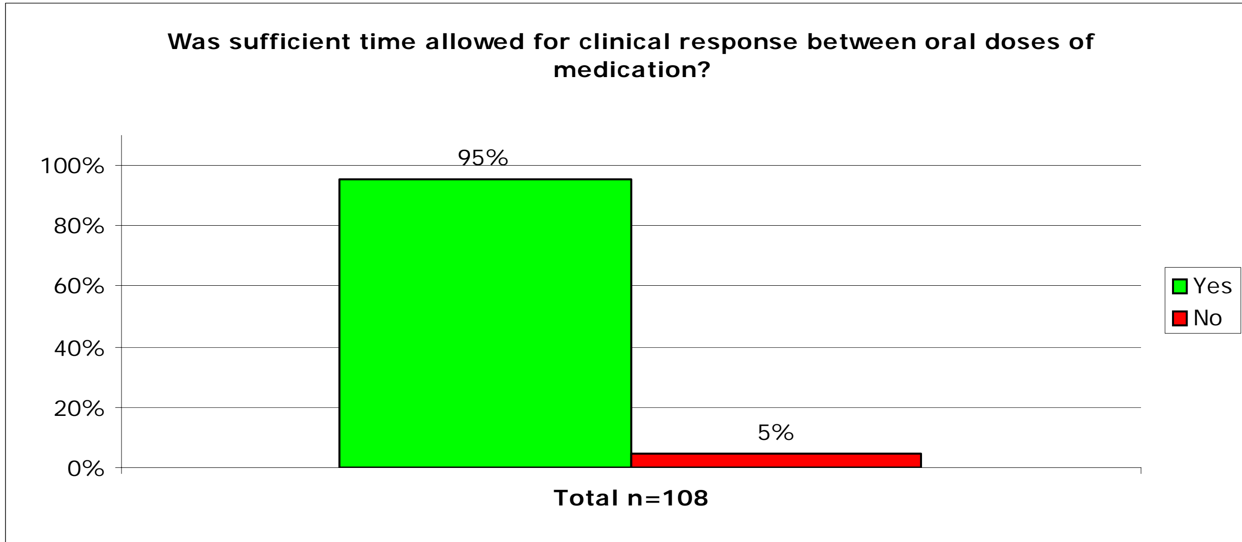
Yes	No	Total n
97%	3%	218



1.8.4.13	**Guideline recommendation** *Sufficient time should be allowed for clinical response between oral doses of medication for rapid tranquillisation (see chart for rapid tranquillisation).*

Was oral medication for the purpose of tranquillisation given more than once during this period of treatment?

Yes	No	Total n
28%	72%	383



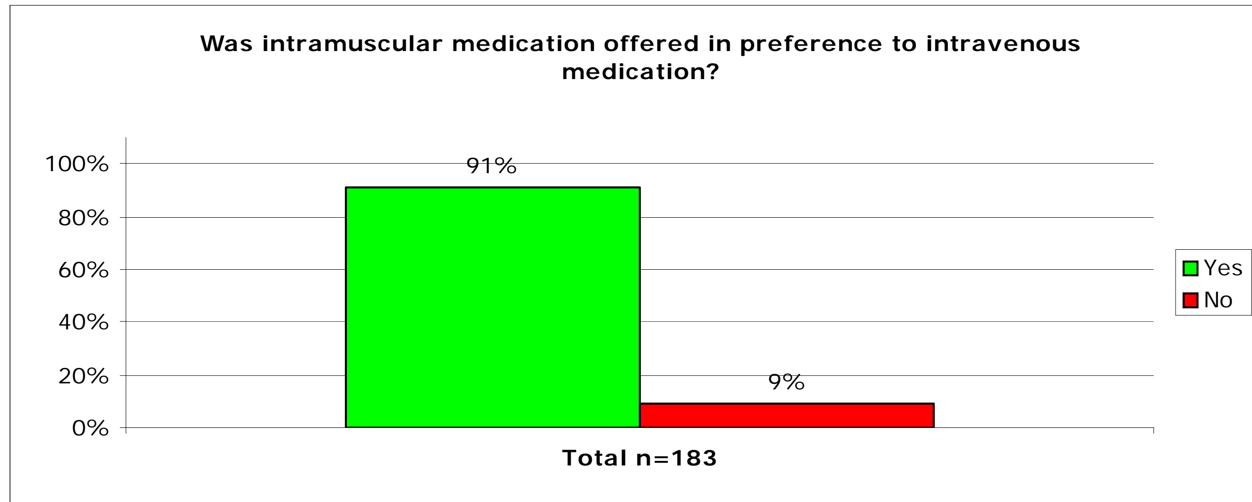
Section 3: the use of intramuscular medication

NOTE: the respondent group for this section included:

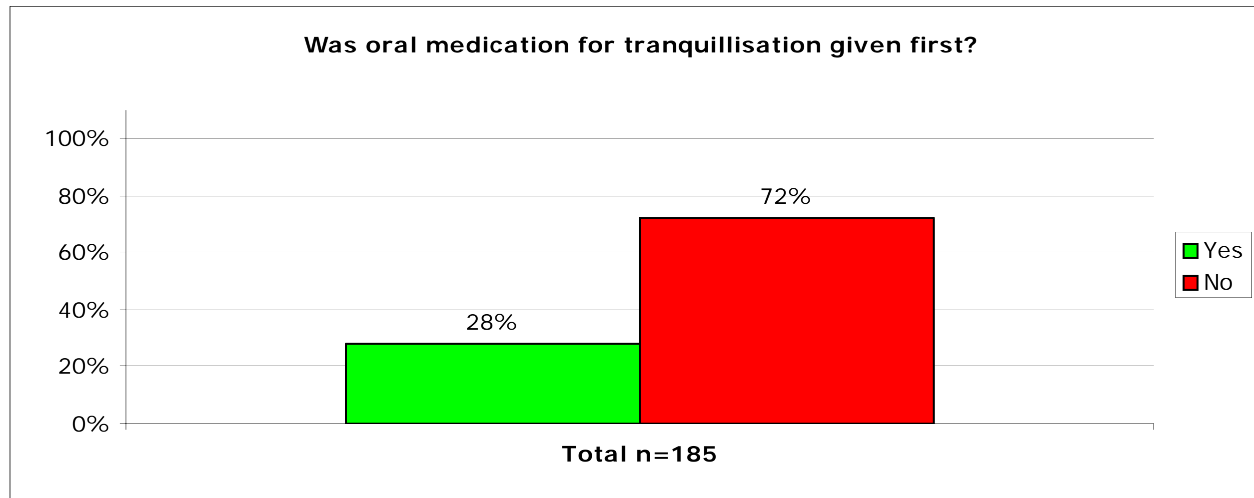
- cases where **ONLY** INTRAMUSCULAR RAPID TRANQUILLISATION was administered;
- cases where ORAL **AND** INTRAMUSCULAR RAPID TRANQUILLISATION were administered.

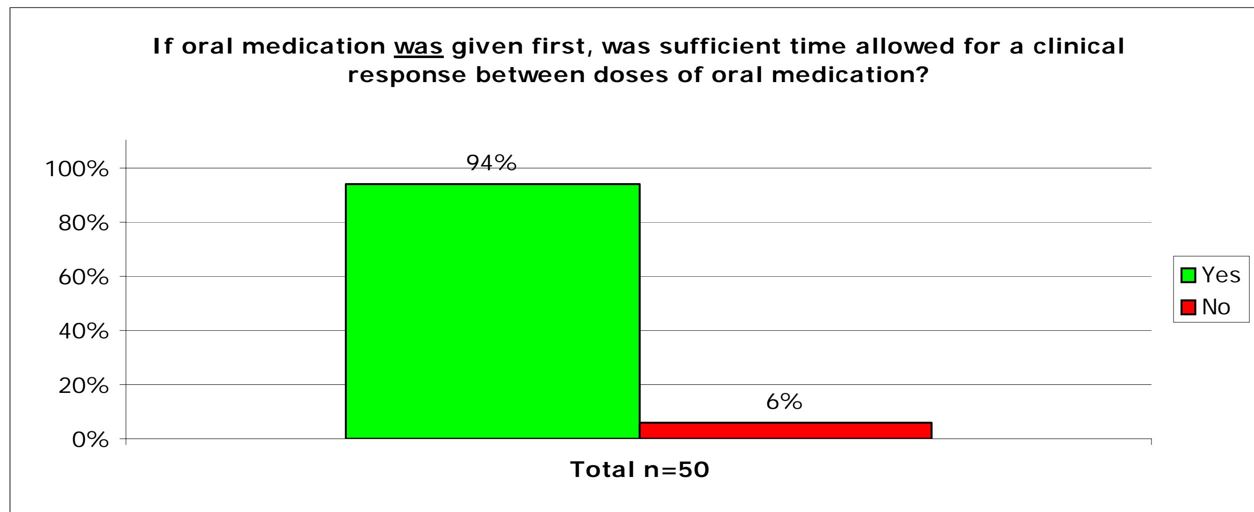
The total number of respondents nationally was 190 (n=190), however, the total figures in some tables/charts do not add up to the expected number due to missing data.

1.8.4.14	**Guideline recommendation** *If parenteral treatment proves necessary, the intramuscular route (i/m) is preferred over intravenous (i/v) from a safety point of view.*



1.8.4.7	**Guideline recommendation** *Oral medication should be offered before parenteral medication as far as possible*

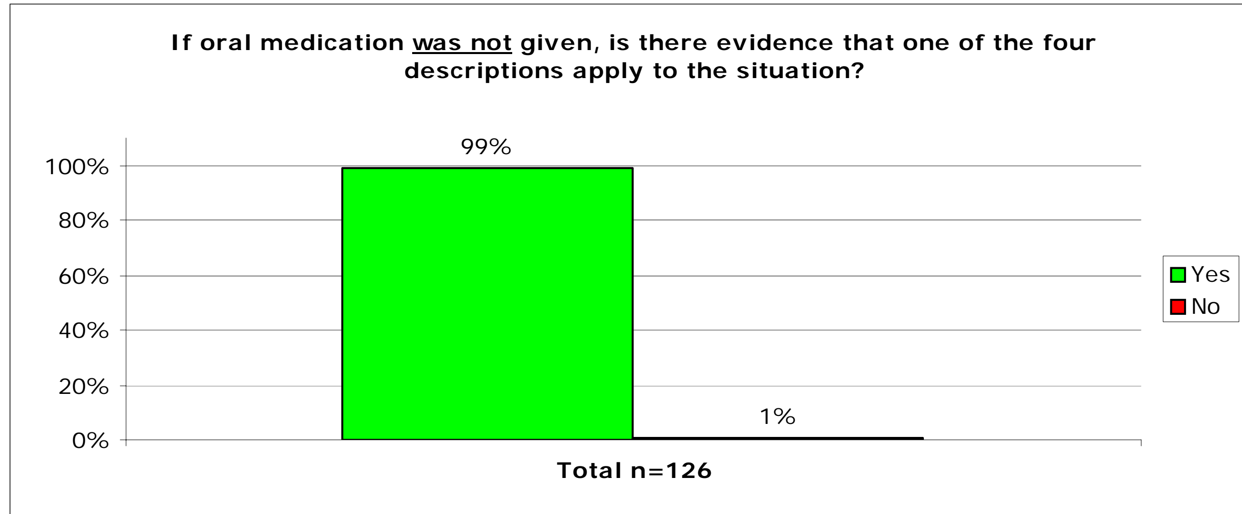




1.8.4.15 **Guideline recommendation**

Where rapid tranquillisation through oral therapy

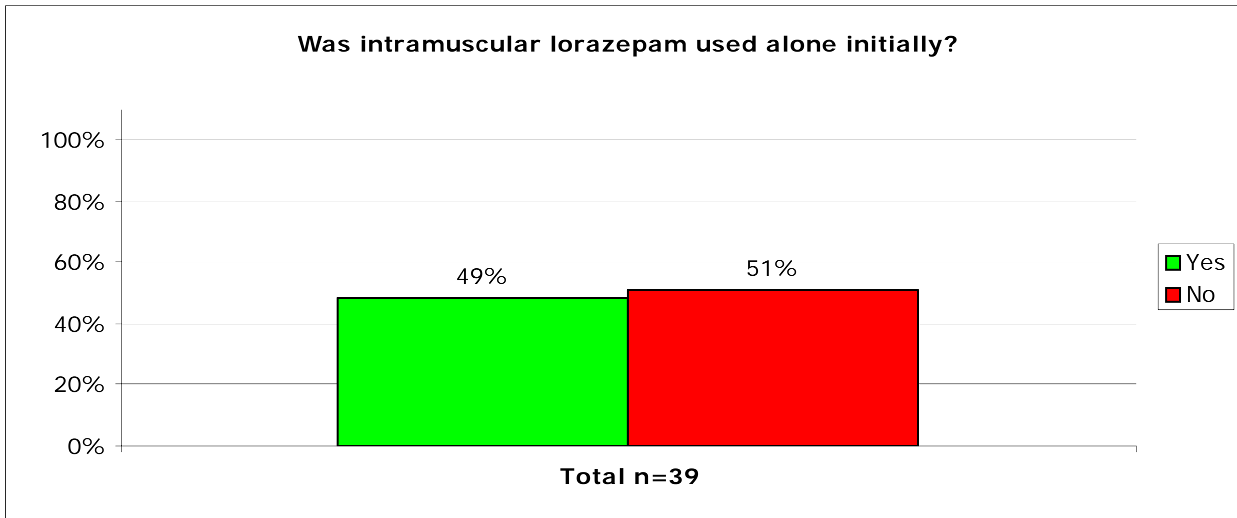
- *is refused*
- *is not indicated by previous clinical response*
- *is not a proportionate response*
- *or is ineffective*
- *a combination of an intramuscular anti-psychotic and an intramuscular benzodiazepine is recommended*



1.8.4.10	**Guideline recommendation** *When the behavioural disturbance occurs in a non-psychotic context it is preferable to initially use oral lorazepam alone or intramuscularly if necessary.*

Did the behavioural disturbance occur in a non-psychotic context?

Yes	No	Total n
22%	78%	181

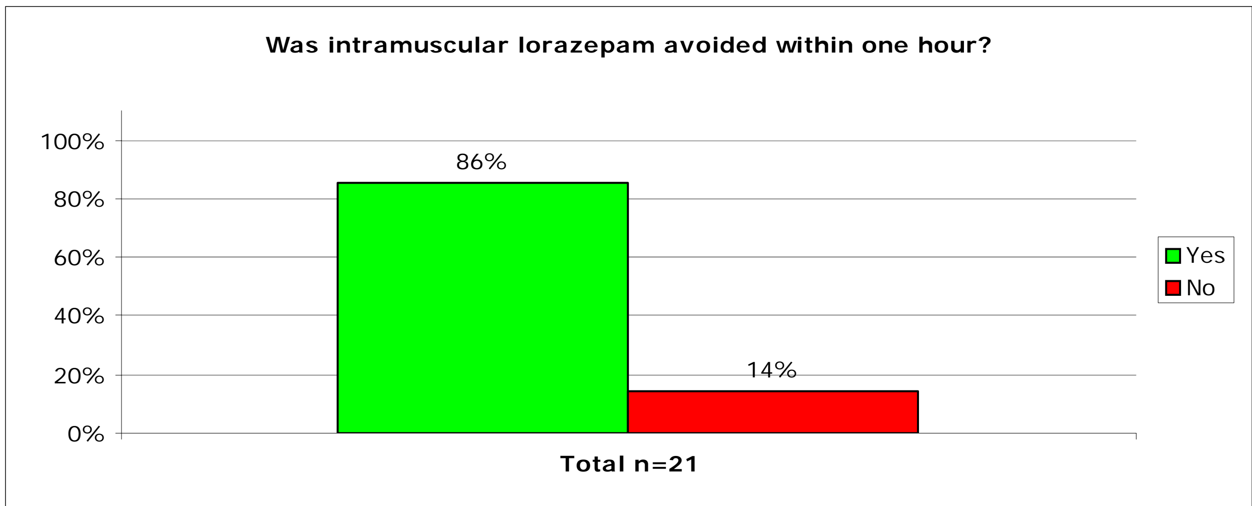


1.8.4.16 Guideline recommendation

In the event of moderate disturbance in service users with psychosis, i/m olanzapine may also be considered. Intramuscular lorazepam should not be given within 1 hour of i/m olanzapine.

Was intramuscular olanzapine given?

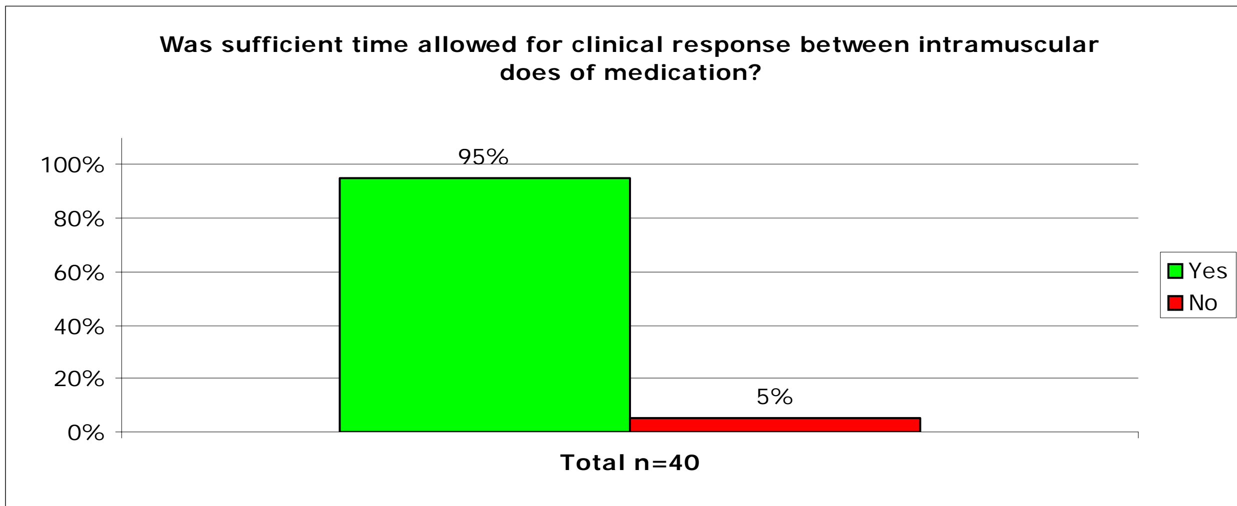
Yes	No	Total n
12%	88%	180



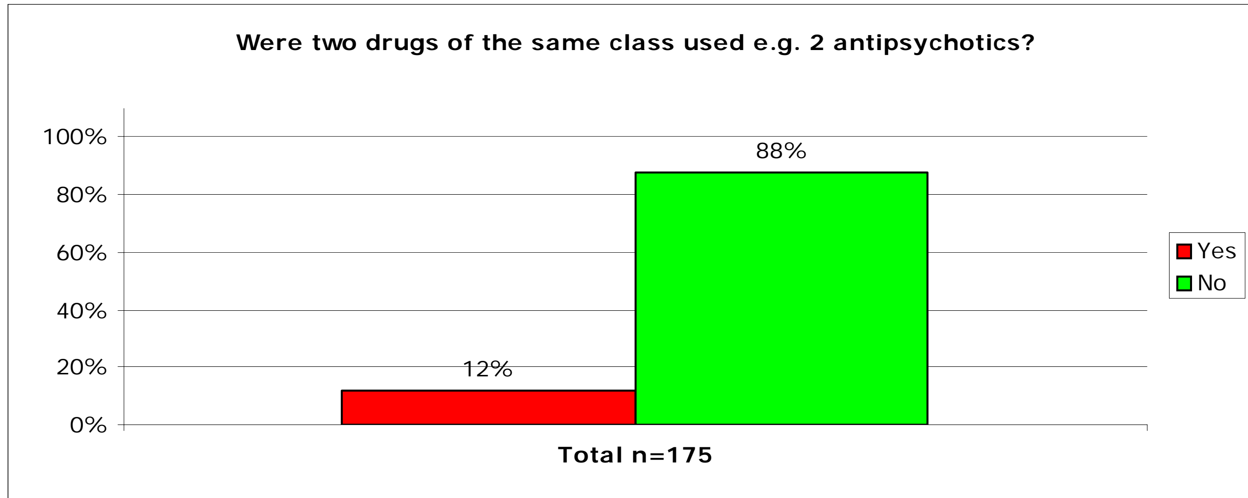
1.8.4.18	**Guideline recommendation**
	Sufficient time should be allowed for clinical response between intramuscular (i/m) doses of medications for rapid tranquillisation (see chart).

Was intramuscular medication given on more than one occasion during this period of treatment?

Yes	No	Total n
23%	77%	176

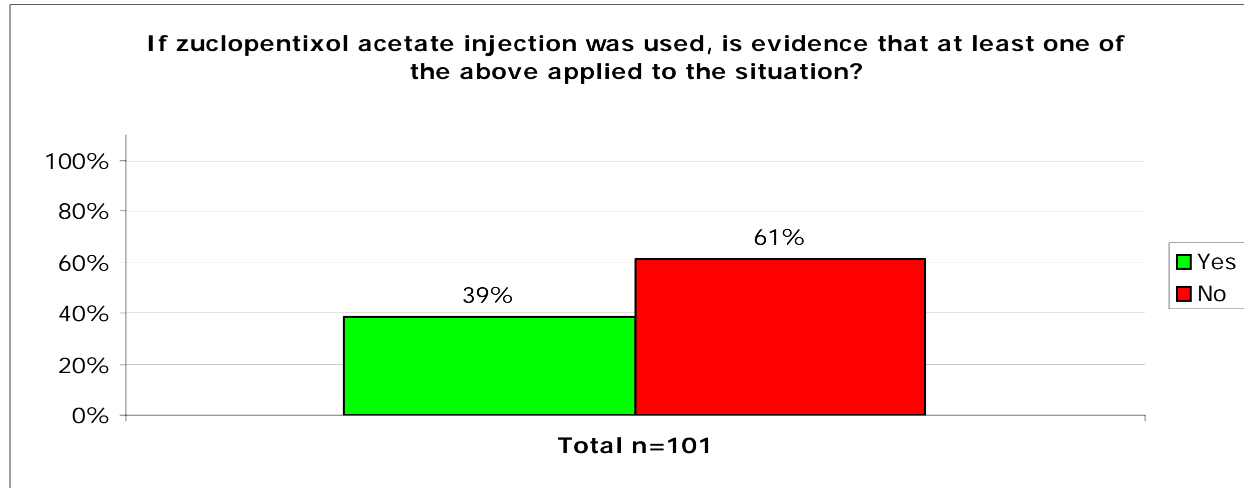


1.8.4.19	**Guideline recommendation** *The use of two drugs of the same class for the purpose of rapid tranquillisation should not occur.*



Use of zuclopentixol acetate (acuphase)

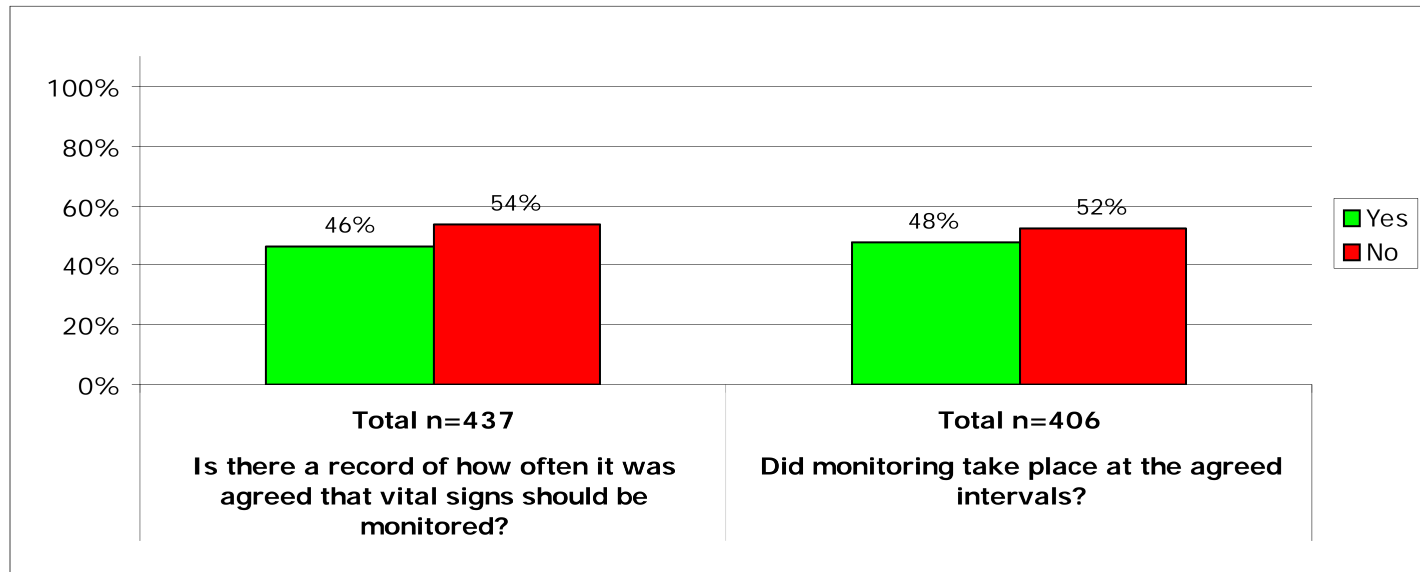
1.8.4.26	**Guideline recommendation**
	Zuclopenthixol acetate injection is not recommended for rapid tranquillisation due to long onset and duration of action. However, zuclopenthixol acetate injection may be considered as an option for rapid tranquillisation when:
	- *it is clearly expected that the service user will be disturbed/violent over an extended period of time*
	- *a service user has a past history of good and timely response to zuclopenthixol acetate injection*
	- *a service user has a past history of repeated parenteral administration*
	- *an advance directive has been made indicating that this is a treatment of choice*



Section 4: Care after rapid tranquillisation if the patient became inactive

NOTE
This section of the audit was completed by **ALL** respondents. The total number of respondents nationally was 532 (n= 532), however, the total national figures in some tables/charts do not add up to the expected number due to missing data.

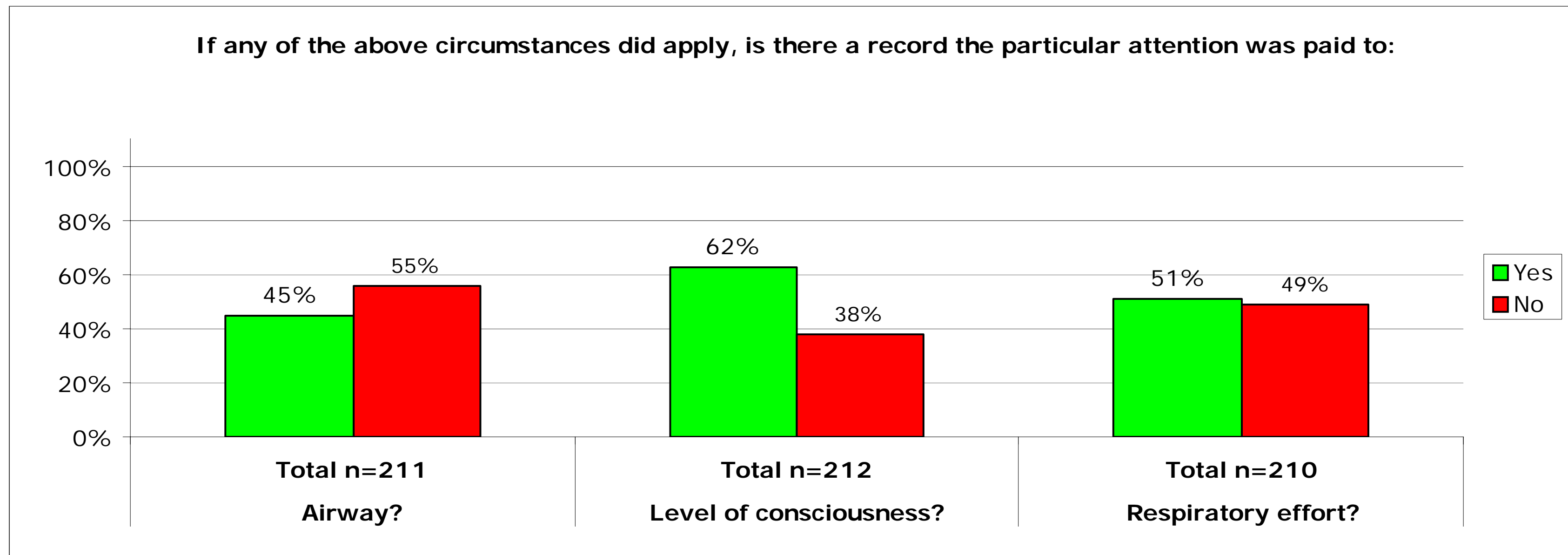
1.8.4.33	**Guideline recommendation** *After rapid tranquillisation is administered, vital signs should be monitored and pulse oximeters should be available. Blood pressure, pulse, temperature, respiratory rate and hydration should be recorded regularly, at intervals agreed by a multidisciplinary team, until the service user becomes active again.*



1.8.4.34	**Guideline recommendation**
	In the following circumstances, more frequent and intensive monitoring by appropriately trained staff is required and should be recorded in the care plan. Particular attention should be paid to the service user's respiratory effort, airway, and level of consciousness: - *if the service user appears to be or is asleep/sedated* - *if intravenous administration has taken place* - *if the BNF limit or SPC is exceeded* - *in high-risk situations* - *where the service user has been using illicit substances or alcohol* - *where the service user has a relevant medical disorder or concurrently prescribed medication*

Did any of the above circumstances apply?

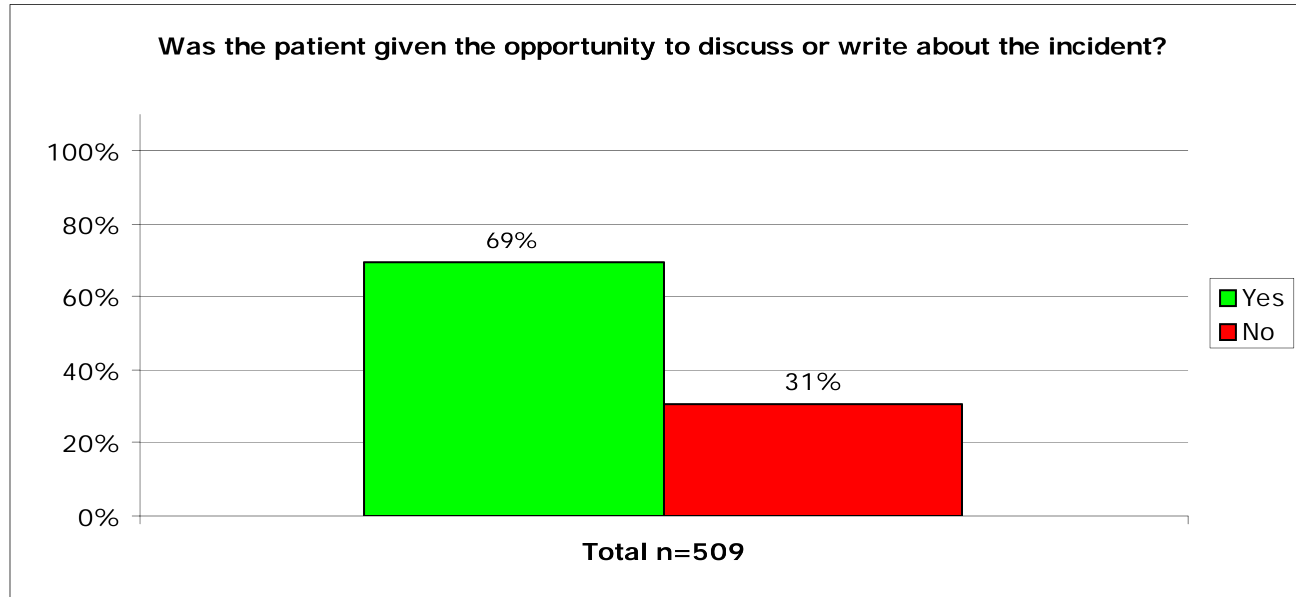
Yes	No	Total n
50%	50%	437



Section 5: Aftercare and support

NOTE
This section of the audit was completed by **ALL** respondents. The total number of sets of notes by audited by services for adults of working age nationally was 532 (n=532), however, the total national figures in some tables/charts do not add up to the expected number due to missing data.

1.8.1.8	**Guideline recommendation** *After the use of rapid tranquillisation, service users should be given the opportunity to document their account of the intervention in their notes.*



Contact details

If you would like to discuss this report or any aspects of the audit, please contact the Audit Team on the details below:

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