

checkCIF/PLATON report

You have not supplied any structure factors. As a result the full set of tests cannot be run.

THIS REPORT IS FOR GUIDANCE ONLY. IF USED AS PART OF A REVIEW PROCEDURE FOR PUBLICATION, IT SHOULD NOT REPLACE THE EXPERTISE OF AN EXPERIENCED CRYSTALLOGRAPHIC REFEREE.

No syntax errors found. CIF dictionary Interpreting this report

Datablock: I

Bond precision:	C-C = 0.0115 A	Wavelength=0.71073
Cell:	a=11.0489(16)	b=13.148(2) c=14.988(2)
	alpha=90	beta=90.971(1) gamma=90
Temperature:	298 K	
	Calculated	Reported
Volume	2177.0(5)	2177.0(6)
Space group	P 21/c	P21/c
Hall group	-P 2ybc	?
Moiety formula	C38 H38 Cl4 N4 Ni3 O10, O	?
Sum formula	C38 H38 Cl4 N4 Ni3 O11	C38 H40 Cl4 N4 Ni3 O11
Mr	1044.59	1046.67
Dx,g cm-3	1.594	1.597
Z	2	2
Mu (mm-1)	1.591	1.591
F000	1068.0	1072.0
F000'	1071.60	
h,k,lmax	13,15,18	13,15,18
Nref	4054	4052
Tmin,Tmax	0.700,0.751	0.711,0.763
Tmin'	0.687	

Correction method= # Reported T Limits: Tmin=0.711 Tmax=0.763
AbsCorr = MULTI-SCAN

Data completeness= 1.000 Theta(max)= 25.500

R(reflections)= 0.0642(2008) wR2(reflections)= 0.2024(4052)

S = 1.049 Npar= 284

The following ALERTS were generated. Each ALERT has the format

test-name_ALERT_alert-type_alert-level.

Click on the hyperlinks for more details of the test.

Alert level B

PLAT245_ALERT_2_B	U(iso) H5A	Smaller than U(eq)	O5	by	0.069 Ang**2
PLAT245_ALERT_2_B	U(iso) H5B	Smaller than U(eq)	O5	by	0.069 Ang**2
PLAT430_ALERT_2_B	Short Inter D...A Contact	O4	..06	.	2.84 Ang.
			x,y,z	=	1_555 Check

Alert level C

PLAT041_ALERT_1_C	Calc. and Reported SumFormula	Strings Differ	Please Check
PLAT043_ALERT_1_C	Calculated and Reported Mol. Weight	Differ by ..	2.08 Check
PLAT048_ALERT_1_C	MoietyFormula Not Given (or Incomplete)	Please Check
PLAT125_ALERT_4_C	No '_symmetry_space_group_name_Hall'	Given	Please Do !
PLAT241_ALERT_2_C	High 'MainMol' Ueq as Compared to Neighbors of		01 Check
PLAT242_ALERT_2_C	Low 'MainMol' Ueq as Compared to Neighbors of		Ni1 Check
PLAT242_ALERT_2_C	Low 'MainMol' Ueq as Compared to Neighbors of		C5 Check
PLAT242_ALERT_2_C	Low 'MainMol' Ueq as Compared to Neighbors of		C16 Check
PLAT242_ALERT_2_C	Low 'MainMol' Ueq as Compared to Neighbors of		C19 Check
PLAT341_ALERT_3_C	Low Bond Precision on C-C Bonds	0.01147 Ang.

Alert level G

FORMU01_ALERT_2_G There is a discrepancy between the atom counts in the
_chemical_formula_sum and the formula from the _atom_site* data.
Atom count from _chemical_formula_sum: C38 H40 Cl4 N4 Ni3 O11
Atom count from the _atom_site data: C38 H38 Cl4 N4 Ni3 O11

CELLZ01_ALERT_1_G Difference between formula and atom_site contents detected.
CELLZ01_ALERT_1_G WARNING: H atoms missing from atom site list. Is this intentional?
From the CIF: _cell_formula_units_Z 2
From the CIF: _chemical_formula_sum C38 H40 Cl4 N4 Ni3 O11
TEST: Compare cell contents of formula and atom_site data

atom	Z*formula	cif sites	diff
C	76.00	76.00	0.00
H	80.00	76.00	4.00
Cl	8.00	8.00	0.00
N	8.00	8.00	0.00
Ni	6.00	6.00	0.00
O	22.00	22.00	0.00

PLAT002_ALERT_2_G	Number of Distance or Angle Restraints on AtSite	3	Note
PLAT005_ALERT_5_G	No Embedded Refinement Details Found in the CIF	Please Do !	
PLAT068_ALERT_1_G	Reported F000 Differs from Calcd (or Missing)...	Please Check	
PLAT300_ALERT_4_G	Atom Site Occupancy of O6	Constrained at	0.5 Check
PLAT302_ALERT_4_G	Anion/Solvent/Minor-Residue Disorder (Resd 2)	100% Note	
PLAT304_ALERT_4_G	Non-Integer Number of Atoms in Resd 2	0.50 Check	
PLAT311_ALERT_2_G	Isolated Disordered Oxygen Atom (No H's ?)	06 Check	
PLAT794_ALERT_5_G	Tentative Bond Valency for Ni1 (II) .	2.20 Info	
PLAT794_ALERT_5_G	Tentative Bond Valency for Ni2 (II) .	1.75 Info	
PLAT860_ALERT_3_G	Number of Least-Squares Restraints	3 Note	
PLAT899_ALERT_4_G	SHELXL97 is Deprecated and Succeeded by SHELXL	2018 Note	

- 0 **ALERT level A** = Most likely a serious problem - resolve or explain
3 **ALERT level B** = A potentially serious problem, consider carefully
10 **ALERT level C** = Check. Ensure it is not caused by an omission or oversight
14 **ALERT level G** = General information/check it is not something unexpected
- 6 ALERT type 1 CIF construction/syntax error, inconsistent or missing data
11 ALERT type 2 Indicator that the structure model may be wrong or deficient
2 ALERT type 3 Indicator that the structure quality may be low
5 ALERT type 4 Improvement, methodology, query or suggestion
3 ALERT type 5 Informative message, check

checkCIF publication errors



Alert level A

PUBL004_ALERT_1_A The contact author's name and address are missing,
_publ_contact_author_name and _publ_contact_author_address.
PUBL005_ALERT_1_A _publ_contact_author_email, _publ_contact_author_fax and
_publ_contact_author_phone are all missing.
At least one of these should be present.
PUBL006_ALERT_1_A _publ_requested_journal is missing
e.g. 'Acta Crystallographica Section C'
PUBL008_ALERT_1_A _publ_section_title is missing. Title of paper.
PUBL009_ALERT_1_A _publ_author_name is missing. List of author(s) name(s).
PUBL010_ALERT_1_A _publ_author_address is missing. Author(s) address(es).
PUBL012_ALERT_1_A _publ_section_abstract is missing.
Abstract of paper in English.



Alert level G

PUBL017_ALERT_1_G The _publ_section_references section is missing or
empty.

7 **ALERT level A** = Data missing that is essential or data in wrong format
1 **ALERT level G** = General alerts. Data that may be required is missing

Publication of your CIF

You should attempt to resolve as many as possible of the alerts in all categories. Often the minor alerts point to easily fixed oversights, errors and omissions in your CIF or refinement strategy, so attention to these fine details can be worthwhile. In order to resolve some of the more serious problems it may be necessary to carry out additional measurements or structure refinements. However, the nature of your study may justify the reported deviations from journal submission requirements and the more serious of these should be commented upon in the discussion or experimental section of a paper or in the "special_details" fields of the CIF. *checkCIF* was carefully designed to identify outliers and unusual parameters, but every test has its limitations and alerts that are not important in a particular case may appear. Conversely, the absence of alerts does not guarantee there are no aspects of the results needing attention. It is up to the individual to critically assess their own results and, if necessary, seek expert advice.

If level A alerts remain, which you believe to be justified deviations, and you intend to submit this CIF for publication in a journal, you should additionally insert an explanation in your CIF using the Validation Reply Form (VRF) below. This will allow your explanation to be considered as part of the review process.

Validation response form

Please find below a validation response form (VRF) that can be filled in and pasted into your CIF.

```

# start Validation Reply Form
_vrf_PUBL004_GLOBAL
;
PROBLEM: The contact author's name and address are missing,
RESPONSE: ...
;
_vrf_PUBL005_GLOBAL
;
PROBLEM: _publ_contact_author_email, _publ_contact_author_fax and
RESPONSE: ...
;
_vrf_PUBL006_GLOBAL
;
PROBLEM: _publ_requested_journal is missing
RESPONSE: ...
;
_vrf_PUBL008_GLOBAL
;
PROBLEM: _publ_section_title is missing. Title of paper.
RESPONSE: ...
;
_vrf_PUBL009_GLOBAL
;
PROBLEM: _publ_author_name is missing. List of author(s) name(s).
RESPONSE: ...
;
_vrf_PUBL010_GLOBAL
;
PROBLEM: _publ_author_address is missing. Author(s) address(es).
RESPONSE: ...
;
_vrf_PUBL012_GLOBAL
;
PROBLEM: _publ_section_abstract is missing.
RESPONSE: ...
;
# end Validation Reply Form

```

If you wish to submit your CIF for publication in Acta Crystallographica Section C or E, you should upload your CIF via the web. If you wish to submit your CIF for publication in IUCrData you should upload your CIF via the web. If your CIF is to form part of a submission to another IUCr journal, you will be asked, either during electronic submission or by the Co-editor handling your paper, to upload your CIF via our web site.

