

GSTR 2000/D6 - Goods and Services Tax: corporate card statements - entitlement to an input tax credit without a tax invoice

 This cover sheet is provided for information only. It does not form part of *GSTR 2000/D6 - Goods and Services Tax: corporate card statements - entitlement to an input tax credit without a tax invoice*

There is an Erratum notice for this document.
This document has been finalised.



Draft Goods and Services Tax Ruling

Goods and Services Tax: corporate card statements - entitlement to an input tax credit without a tax invoice

| Contents | Para |
|---------------------------|------|
| What this Ruling is about | 1 |
| Date of effect | 6 |
| Background | 7 |
| Ruling | 15 |
| Explanations | 28 |
| Definitions | 62 |
| Detailed contents list | 72 |
| Your comments | 73 |

Preamble

*This document is a draft for industry and professional comment. As such, it represents the preliminary, though considered views of the Australian Taxation Office. This draft may not be relied on by taxation officers, taxpayers and practitioners as it is not a Ruling or advice in terms of section 37 of the **Taxation Administration Act 1953**. When officially released it will be a public ruling for the purposes of section 37 and may be relied upon by any person to whom it applies.*

What this Ruling is about

1. This Ruling explains the determination that the Commissioner proposes to make under subsection 29-10(3) of the *A New Tax System (Goods and Services Tax) Act 1999* ('the GST Act'). The determination sets out circumstances in which a registered entity that holds a corporate card statement can claim an input tax credit without holding a tax invoice. This Ruling also explains how a corporate card provider can request the Commissioner to make a further determination in respect of statements they issue.

2. The Ruling also:

- (a) describes the information that a corporate card statement must contain for the proposed determination to apply;
- (b) sets out the requirements you must meet for the proposed determination to apply to you; and
- (c) sets out the requirements the corporate card provider must meet when issuing a corporate card statement for the proposed determination to apply.

3. Certain terms used in this Ruling are defined or explained in the **Definitions** section of the Ruling. These terms, when first mentioned elsewhere in the body of the Ruling, appear in **bold** type.

4. The expression 'you' in this Ruling refers to the registered entity that is the corporate holder of the credit card.

GSTR 2000/D6

5. All legislative references are to the GST Act (unless otherwise specified).

Date of effect

6. This Ruling, when finalised, will take effect on and from 8 July 1999 (the date of Royal Assent to the Goods and Services Tax ('GST') Legislation).

Background

Input tax credits

7. You can claim an input tax credit for any creditable acquisition that you make.¹ An acquisition is creditable if:²

- you acquire a supply solely or partly for a creditable purpose;
- the supply to you is taxable;
- you provide, or are liable to provide, consideration for the supply; and
- you are registered, or required to be registered.

Creditable purpose

8. You acquire something for a creditable purpose if you acquire it in carrying on your enterprise.³ Something that you acquire will not be for a creditable purpose if:⁴

- it relates to making input taxed supplies; or
- it is of a private or domestic nature.

9. The input tax credit for a creditable acquisition is usually the amount of GST that is payable by the supplier.⁵ If an acquisition is partly creditable, you will need to apportion the input tax credit.

10. Your input tax credits are offset against your GST payable for a particular tax period.⁶

¹ Section 11-20

² Section 11-5

³ Subsection 11-15(1).

⁴ Subsection 11-15(2).

⁵ Section 11-25.

⁶ Subsection 17-5(1).

Tax invoices

11. You cannot claim an input tax credit in your GST return⁷ for a particular tax period unless you hold a tax invoice.⁸ However, if the GST exclusive value of the taxable supply is \$50 or less, you will not need a tax invoice.⁹

12. The GST Act requires that a tax invoice must:¹⁰

- be issued by the supplier (except if the Commissioner determines that the tax invoice can be issued by the recipient);
- set out the Australian Business Number (ABN) of the **entity** that issues it;
- set out the price for the taxable supply;
- contain such other information as the regulations¹¹ specify; and
- be in the approved form.

13. A tax invoice for a taxable supply that is made through a GST branch must show the GST branch registration number of the branch.¹²

14. However, the Commissioner can determine that, in certain circumstances, you may claim an input tax credit in your GST return for a particular tax period without holding a tax invoice.¹³

Ruling**Circumstances in which a tax invoice is not required**

15. The Commissioner proposes to make a determination that provides that you are entitled to an **input tax credit** for a **creditable acquisition** without holding a **tax invoice** when you lodge your Business Activity Statement ('BAS') if you hold a corporate card statement from a corporate card provider and the following requirements are satisfied:

- (a) the corporate card statement has the following details:
 - (i) your name;

⁷ Your GST return is part of your Business Activity Statement.

⁸ Subsection 29-10(3).

⁹ Subsection 29-80(1).

¹⁰ Subsection 29-70(1).

¹¹ The Regulations about tax invoice information requirements are set out in Part 2-6 of the *A New Tax System (Goods and Services Tax) Regulations 1999*.

¹² Paragraph 54-50(1)(a).

¹³ Subsection 29-10(3).

GSTR 2000/D6

- (ii) the name(s) of your employee(s) who purchased the creditable acquisition;
 - (iii) your Australian Business Number ('ABN') or address;
 - (iv) the date you purchased each supply on the statement;
 - (v) supplier's name;
 - (vi) supplier's ABN;
 - (vii) supplier's Branch Registration Number (where applicable);
 - (viii) a brief description of each supply or, if unavailable, a description of each supplier's industry;
 - (ix) the amount of GST paid for each supply; and
 - (x) the total price paid for each supply; and
- (b) you have an effectively regulated corporate policy which provides that the corporate card must not, in any circumstances, be used for private or personal expenditure; and
- (c) your corporate card provider meets the conditions outlined in paragraphs 17 to 22.

16. However, in some circumstances you may still need to obtain a tax invoice to substantiate creditable acquisitions from certain suppliers (see paragraph 27 below).

Additional requirements for the corporate card provider

17. This Ruling only applies to a **corporate card** provided by a corporate card provider. If your card is not a corporate card provided by a corporate card provider you will need a tax invoice to substantiate your taxable supplies. For the purposes of this Ruling, the following credit or charge card providers are corporate card providers:

- VISA International;
- American Express International;
- Diners Club International; and
- MasterCard International.

Applications for determinations in respect of other corporate card providers

18. A card provider that is not one of the corporate card providers listed in paragraph 17 above can request that the Commissioner make a determination in respect of the card statements they issue. We explain the procedures to be followed when making these requests in paragraphs 59 to 61 below.

Tax point of the supply

19. The corporate card statement must show the date the goods or services were purchased from the supplier (see paragraphs 33 to 37). In some instances this may be same as the date the information was transmitted by the supplier to the corporate card provider.

Requirements for certain corporate card providers

20. Rather than modifying existing point of sale systems, some corporate card providers may, in the interim, prefer to obtain information such as the merchant's ABN and registration status separately and then determine the GST amount by using a 1/11th calculation of the GST-inclusive price of the supply.

21. In these circumstances, where the merchant is unable to transmit all the details required on the statement to the corporate card provider for supplies it makes, the corporate card provider must, before including a GST amount in their statement:

- obtain a signed statement from each merchant that states:
 - (i) the merchant's ABN and Branch Registration Number (where applicable);
 - (ii) whether or not the merchant is registered for GST;
 - (iii) the type of supply or supplies (i.e., taxable, GST-free and/or input taxed) the merchant provides;
 - (iv) where the merchant only provides taxable supplies, whether or not GST is calculated at 1/11th of the price for all the taxable supplies the merchant provides; and
 - (v) provides the corporate card provider with an undertaking that they will notify them either-
 - when they cease to be registered for GST; or

GSTR 2000/D6

- when they cease to make only taxable supplies where the GST is calculated at 1/11th of the price;
- retain the signed statement for at least 5 years after the merchant ceases their association with the corporate card provider;
- clearly identify each supply in the statement that may be a GST-free, input taxed or mixed supply;
- clearly identify each supply where GST may not be 1/11th of the price; and
- where a supply has been identified as being a supply that may be a GST-free, input taxed or a supply where GST may not be 1/11th of the price, advise the entity to obtain a tax invoice before attributing an input tax credit to a tax period.

22. Where the corporate card provider obtains information that the merchant is not registered, or ceases to be registered for GST, the corporate card provider should not calculate an amount of GST but state the amount of GST included in the price of the supply as being \$nil.

Double claiming of input tax credits

23. If you receive a tax invoice for supplies that, because of this Ruling, you are able to substantiate using your corporate card statement, you cannot use both the tax invoice and the corporate card statement to substantiate and attribute your input tax credit claim to a tax period.

24. In this situation you must not use the tax invoice to attribute your input tax credits to a tax period, unless you receive the tax invoice before the applicable corporate card statement¹⁴ and you choose to use the tax invoice to substantiate your input tax credits (see paragraph 36). Where you receive the tax invoice before the applicable corporate card statement and you use the tax invoice to substantiate your input tax credits, you must not later use the statement to claim your input tax credits as you will be double claiming you input tax credit entitlement.

25. If you make a false statement to a tax officer which leads to your **net amount** for a tax period being incorrect you may be guilty of an offence (section 46 of the *Taxation Administration Act 1953*).

¹⁴ The applicable corporate card statement is the corporate card statement that informs you of your liability to the credit card provider for the supply to which the tax invoice relates.

Additional requirements for suppliers

26. There are no additional requirements for suppliers. However, as an accounting control option to avoid double counting of input tax credits, a supplier can choose to indicate on any tax invoice they issue whether or not the payment was made via a corporate card.

Situations where you need to obtain a tax invoice

27. Where the corporate card statement indicates that the supply may be a **mixed supply** or a taxable supply where GST is not 1/11th of the price, you need to obtain a tax invoice to substantiate the input tax credits for the supply. If you don't already hold one, you will need to ask the supplier for a tax invoice before attributing an input tax credit to a tax period.

Explanations (this forms part of the Ruling)

28. In business today many entities use corporate credit or charge cards as a means of keeping expenses under control as well as eliminating much of the paperwork traditionally surrounding the purchasing process.

29. The main features of the corporate card are that it generally relieves suppliers from issuing invoices and entities from obtaining source documents from their employees before processing payments. It also reduces the need for multiple payments.

Information on the corporate card statement

30. The corporate card statement must contain all the information that is set out in paragraph 15 of this Ruling. If you receive a corporate card statement from a corporate card provider that is missing some of the information required you must obtain a tax invoice before attributing input tax credits to a tax period.

Your name

31. The name on the statement may be your legal name or your business name.

GSTR 2000/D6

Date (and tax point) of supply

32. It is important for entities to know the date they acquired the goods or services for attribution purposes. Generally your input tax credit is attributable to the tax period in which you provide any of the consideration or an earlier **invoice** is issued relating to the supply. However, if you account for GST on a cash basis your input tax credits are attributable to the tax period in which you actually pay for the goods or services.¹⁵

33. When a payment is made by crediting or charging to a corporate card in person, consideration is provided and received when the recipient of the supply signs to authorise the transaction. When a payment is made remotely (e.g., by telephone or Internet) the consideration is provided and received when the cardholder gives the card number and other required details.¹⁶

34. This is because once the cardholder signs the corporate card voucher or provides the card number and other details, they are unconditionally discharged from their liability to pay the supplier¹⁷ and consideration is both provided and received for the purposes of the GST Act.

35. There may be circumstances where the supplier does not transmit the information relating to the sale to the corporate card provider for a number of months. In these circumstances you will not be able to attribute the input tax credit until you receive the corporate card statement with the details of the creditable acquisition on it, unless you hold a tax invoice.

36. However, the supplier must attribute the GST payable to the tax period in which the recipient of the taxable supply signed the corporate card voucher or provided the card number and other details. Where the supplier accounts for GST on a non-cash basis and an invoice is issued in respect of the supply before any of the consideration is received, the supplier must attribute the GST payable to the tax period in which the invoice was issued.¹⁸

¹⁵ Regardless of which accounting method you use, you cannot claim an input tax credit unless you received a tax invoice (or corporate card statement if this Ruling applies to you).

¹⁶ A future GST draft Ruling, expected to be issued in May 2000, outlines the time that a supply is purchased or sold.

¹⁷ *Re Charge Card Services Ltd* [1988] 3 All ER 702 and *Customs and Excise Commissioners v. Diners Club Ltd* [1989] 2 All ER 385.

¹⁸ section 29-5.

Where the creditable acquisitions on the statement relate to more than one tax period

37. The creditable acquisitions listed on a corporate card statement may relate to more than one tax period. You can only attribute your input tax credits for each acquisition on the statement to the tax period to which the creditable acquisition relates.

Example

38. Foreman Enterprises is registered for GST and has monthly tax periods. Foreman Enterprises satisfies the requirements outlined in this Ruling and is able to use its corporate card statement to attribute input tax credits to a tax period. An extract from the corporate card statement outlines the following expenditure of Foreman Enterprises' employee:

| <i>Date of purchase</i> | <i>Supplier</i> | <i>descp</i> | <i>Price</i> | <i>GST amt</i> |
|-------------------------|--|------------------|--------------|----------------|
| 28 Aug 2000 | Cameras 'R' Us (ABN xxx xxx xxx xx) | Photo film | \$220 | \$20 |
| 8 Sept 2000 | Motex (ABN xxx xxx xxx xx) | Petrol | \$44 | \$4 |
| 15 Sept 2000 | Better TVs (ABN xxx xxx xxx xx) | Electrical goods | \$649 | \$59 |
| 1 Oct 2000 | BCD Hardware (ABN xxx xxx xxx xx) | Paint, tools | \$550 | \$50 |

39. Foreman Enterprises have not received a tax invoice for any of the purchases above. The earliest tax period in which Foreman enterprises is able to attribute the input tax credits totalling \$83 is the September 2000 tax period. The input tax credit of \$50 can not be attributed to the September 2000 tax period, but is able to be attributed to the following tax period.

Supplier's branch registration number

40. An entity with a separately registered GST branch may make some supplies through that branch. When an entity registers a GST branch, the Commissioner will notify the entity of the GST branch registration number.¹⁹

¹⁹ Section 54-15.

GSTR 2000/D6

41. Where an entity makes a taxable supply through a GST branch, the entity must show the GST branch registration number on any tax invoice it issues relating to a taxable supply.²⁰

42. Similarly, where you purchase a creditable acquisition using a corporate card through a GST Branch, the corporate card provider must provide the merchant's GST Branch Registration Number on the corporate card statement. This is in addition to the requirement of providing the supplier's ABN.

Brief description

43. The corporate card statement must have a brief description of the supply on the statement. Where this information cannot be provided, a description of the supplier's industry (e.g., food and beverages, fuel) will suffice.

Liability

44. A lot of corporate cards provide different liability schemes to suit the cardholder's preferences and obligations. Generally, there are 3 different types of liability scheme that apply:

- the corporate entity is fully liable for the expenses incurred on the corporate card;
- the corporate entity and the individual cardholder's are jointly and severally liable for the expenses incurred on the corporate card; or
- the individual is wholly liable for the expenses incurred on the corporate card.

45. It makes no difference which liability scheme applies to the card. Division 111 has special rules to cover the situation where you reimburse an employee, an officer of a company or a partner for an expense they incur for an acquisition directly related to that position.

46. Providing the requirements of the Division are met, the reimbursement is treated as consideration for an acquisition you make from that person.²¹ You may claim the input tax credit for a creditable acquisition if you hold the corporate card statement that was issued to the person you reimbursed.²²

47. However, you must ensure that you have a policy that prohibits personal or private expenditure on the card.

²⁰ Paragraph 54-50(1)(a).

²¹ Subsection 111-5(1).

²² Section 111-15.

Situations where you will need to get a tax invoice

48. There may be some situations where you will still need to obtain a tax invoice even if all the requirements outlined in this Ruling are satisfied.

49. You will need to obtain a tax invoice before claiming an input tax credit in circumstances where the corporate card statement indicates that you need to obtain one.

Example

50. The following is an extract from Cason Cookies corporate card statement:

| <i>Date of purchase</i> | <i>Supplier</i> | <i>descp</i> | <i>Price</i> | <i>GST amt</i> |
|-------------------------|--------------------------------------|-------------------|--------------|----------------|
| 08 Dec 2000 | Publiccharge (ABN xxx xxx xxx xx) | Taxi travel | \$19.60 | \$1.78 |
| 11 Dec 2000 | J-Mart (ABN xxx xxx xxx xx) | Retail | \$220.00 | \$20.00* |
| 11 Dec 2000 | Motex (ABN xxx xxx xxx xx) | fuel, consumables | \$66.00 | \$6.00* |

* Important: This may be a mixed supply. The GST has been calculated as if the supply was wholly taxable at 1/11th of the price. You will need to obtain a tax invoice before claiming an input tax credit in relation to this supply.

51. Cason Cookies will need to obtain a tax invoice to substantiate their input tax credit claim for the purchases from J-Mart and Motex.

Additional requirements for corporate card providers*Additional requirements for certain corporate card providers*

52. Corporate card providers that do not obtain all the information outlined in paragraph 15 from the merchant must satisfy the additional requirements in paragraphs 20 to 22. These requirements are needed to ensure that an entity's net amount for a tax period is accurate, even when they use a corporate card statement to attribute their input tax credits to a tax period.

53. Where the merchant does not provide the corporate card provider with a signed statement (of the kind referred to in paragraph 21), the corporate card provider should not include a GST amount for that merchant in the corporate card statement.

GSTR 2000/D6

54. Similarly, where the corporate card provider is unsure or is sceptical of whether a merchant is registered for the purposes of GST, the corporate card provider should not include a GST amount for that merchant in the corporate card statement.

55. It may be an offence for a corporate card provider, knowingly or otherwise, to make a false statement to an entity where that false statement leads to the net amount of that entity to be different from the net amount properly payable or receivable.²³

Errors on the corporate card statement

56. Where there is an error on the corporate card statement that relates to one or more supplies on the statement, the entity will need a tax invoice to attribute their input tax credits to a tax period for those supplies to which the error relates. The corporate card statement may still be used instead of a tax invoice for other supplies (if any) on the statement.

57. If the all information that is required by paragraph 15 is not provided, or, for example, your name or ABN on the statement is incorrect, you will need a tax invoice for all supplies on the statement.

Electronic statements

58. The information requirements for a corporate card statement, as outlined in this Ruling, apply irrespective of the form of the document. If a corporate card statement is included in an electronic message, the recipient is obliged to retain that message in a readily accessible form for five years in accordance with the GST record keeping requirements (section 70 of the *Taxation Administration Act 1953*).

Other corporate card providers

59. Registered corporate card providers not covered by the proposed determination, may request the Commissioner to determine that entities who hold certain corporate card statements they issue do not need to hold a tax invoice to attribute input tax credits to a tax period. This will be determined on the basis of the amount of information the corporate card provider can detail in their statement as well as other information such as the corporate card provider's client and merchant base.

60. Requests for a determination should be made in writing and include the following information and documents:

²³ Section 46 of the *Taxation Administration Act 1953*.

- (a) registered name of the corporate card provider and its ABN;
 - (b) a sample of the corporate card statement the corporate card provider proposes to issue;
 - (c) the nature and type of corporate card(s) the corporate card provider issues;
 - (d) the number of clients the corporate card provider has;
 - (e) the type of industry in which the clients operate;
 - (f) the number of merchants who accept payment via the corporate card;
 - (g) the details of how the information will be transmitted from the merchant to the corporate card provider;
 - (h) the details of what information will be transmitted from the merchant to the corporate card provider;
 - (i) an explanation as to why the determination is requested.
61. Applications should be addressed to:
- GST General Technical Advice
P O Box 9935
in your capital city
- or**
- E-mail to: gstmail@ato.gov.au
- or**
- Facsimile: 1300 139 031

Definitions

62. The following terms are defined for the purposes of this Ruling. Terms with asterisks are defined in section 195-1 of the GST Act:

Entities

63. Entity means any of the following:
- (a) an *individual;
 - (b) a body corporate;
 - (c) a corporation sole;
 - (d) a body politic;

GSTR 2000/D6

- (e) a *partnership;
- (f) any other unincorporated association or body or persons;
- (g) a trust;
- (h) a *superannuation fund.

Input tax credit

64. You are entitled to the input tax credit for any *creditable acquisition that you make.

Creditable acquisition

65. You make a creditable acquisition if:
- (a) you acquire anything solely or partly for a *creditable purpose; and
 - (b) the supply of the thing to you is a *taxable supply; and
 - (c) you provide, or are liable to provide, *consideration for the supply; and
 - (d) you are *registered, or *required to be registered.

Tax invoice

66. A tax invoice for a *taxable supply:
- (a) must be issued by the supplier, unless it is a *recipient created tax invoice (in which case it must be issued by the *recipient); and
 - (b) must set out the *ABN of the entity that issues it; and
 - (c) must set out the *price for the supply; and
 - (d) must contain such other information as the regulations specify; and
 - (e) must be in the *approved form.

A tax invoice must also satisfy the requirements of section 54-40, if applicable.

Corporate card statement

67. A corporate card statement is a statement of liability that is issued by a corporate card provider to one of its clients.

Corporate card

68. A corporate card is a card that is issued to and in the name of an *entity and is used to purchase goods and services solely for commercial purchases.

Net amount

69. Amounts of GST and amounts of input tax credits are set off against each other to produce a *net amount (which may be altered to take account of *adjustments).

Mixed supply

70. A supply of 1 or more *taxable supplies and any one of the following supplies:

- a supply that is *GST-free or *input taxed;
- a supply that was made before 1 July 2000.

Invoice

71. A document notifying an obligation to make a payment.

Detailed contents list

72. Below is a detailed contents list for this Ruling:

| | Paragraph |
|--|------------------|
| What this Ruling is about | 1 |
| Date of effect | 6 |
| Background | 7 |
| Input tax credits | 7 |
| Creditable purpose | 8 |
| Tax invoices | 11 |
| Ruling | 15 |
| Circumstances in which a tax invoice is not required | 15 |
| Additional requirements for the corporate card provider | 17 |
| <i>Application for determinations in respect of other corporate card providers</i> | <i>18</i> |
| <i>Tax point of supply</i> | <i>19</i> |

GSTR 2000/D6

| | |
|---|-----------|
| <i>Requirements for certain corporate card providers</i> | 20 |
| Double claiming of input tax credit entitlement | 23 |
| Additional requirements for suppliers | 26 |
| Situations where you need to obtain a tax invoice | 27 |
| Explanations (this forms part of the Ruling) | 28 |
| Information on the corporate card statement | 30 |
| <i>Your name</i> | 31 |
| <i>Date (and tax point) of supply</i> | 32 |
| <i>Where the creditable acquisitions on the statement relates to more than one tax period</i> | 37 |
| <i>Example</i> | 38 |
| <i>Supplier's branch registration number</i> | 40 |
| <i>Brief description</i> | 43 |
| Liability | 44 |
| Situations where you will need to get a tax invoice | 48 |
| <i>Example</i> | 50 |
| Additional requirements for corporate card providers | 52 |
| <i>Additional requirements for certain corporate card providers</i> | 52 |
| <i>Errors on the corporate card statement</i> | 56 |
| <i>Electronic statement</i> | 58 |
| Other corporate card providers | 59 |
| Definitions | 62 |
| Entities | 63 |
| Input tax credit | 64 |
| Creditable acquisition | 65 |
| Tax invoice | 66 |
| Corporate card statement | 67 |
| Corporate card | 68 |
| Net amount | 69 |
| Mixed supply | 70 |
| Invoice | 71 |
| Detail contents list | 72 |
| Your comments | 73 |

Your comments

73. If you wish to comment on this Ruling, please send your comments promptly by 1 May 2000 to:

Contact Officer: Usha Narain
Telephone: (02) 6216 1432
Facsimile: (02) 6216 1959
Email: usha.narain@ato.gov.au
Address: GST Law & Interpretation
PO Box 900
CIVIC SQUARE ACT 2608.

Commissioner of Taxation

12 April 2000

Previous draft:

Not previously issued in draft form

Related Rulings/Determinations:

Subject references:

- goods and services tax
- tax invoices
- input tax credits
- creditable acquisition

Legislative references:

- ANTS(GST)A 11-5
- ANTS(GST)A 11-15(1)
- ANTS(GST)A 11-15(2)
- ANTS(GST)A 11-20
- ANTS(GST)A 11-25
- ANTS(GST)A 17-5(1)

- ANTS(GST)A 29-5
- ANTS(GST)A 29-10(3)
- ANTS(GST)A 29-70(1)
- ANTS(GST)A 29-80(1)
- ANTS(GST)A 54-15
- ANTS(GST)A 54-50(1)(a)
- ANTS(GST)A 111-5(1)
- ANTS(GST)A 111-15
- TAA 46
- TAA 70

Case references:

- Re Charge Card Services Ltd
[1988] 3 All ER 702
- Customs and Excise
Commissioners v. Diners Club Ltd
[1989] 2 All ER 385

ATO references:

NO T2000/6428

BO

FOI number:

ISSN: 1443-5160