
SINGAPORE ELECTRICITY MARKET

VESTING CONTRACT

Between

(the “Holder”)

and

SP Services Limited

(the “Issuer”)

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1 INTERPRETATION

1.1 WORDS TO HAVE SAME MEANING

Unless the context otherwise requires or the term is otherwise defined in clause 1.2, capitalised expressions and other terms used in this Contract have the meanings ascribed thereto in the Electricity Act (Cap. 89A).

1.2 OTHER MEANINGS

In this Contract, unless the context otherwise requires:

“Act” means the Electricity Act (Cap.89A);

“Aggregate Hedge Quantity” means the total hedge quantities allocated to all Holders of the Vesting Contract for each Half Hour;

“Business Day” means a day other than a National Holiday, a Saturday or a Sunday;

“Contract” means this Contract, including the recitals and any schedules to this Contract, and the expressions “hereof”, “herein”, “hereto”, “hereunder”, “hereby” and similar expressions refer to this Contract and not to any particular clause or other portion of this Contract;

“Counter Parties” means all persons that are parties to a Vesting Contract other than this Contract and “Counter Party” shall be construed accordingly;

“Contingency Plan” means the procedures and processes described in a document of the same name which has been annexed to this Contract as “Appendix C” for identification purposes and the contents of which may be amended by the Issuer from time to time with approval of the Authority and notified to the Holder.

“Default Rate” means the rate which is four percentage points (4%) above the arithmetic average of the rates quoted by the Development Bank of Singapore Limited, Overseas Chinese Banking Corporation Limited, and United Overseas Bank Limited (or such other banks as the Authority may specify in writing from time to time) as being the respective prime lending rates of such banks for each day of the period for which interest accrues, and in respect of any day during such period which is not a day for which such a rate is quoted the last preceding rate quoted shall apply.

“Difference Credit” means an amount by which the Settlement Account of a Party is credited or, where clause 4.2 applies, an amount to which a Party is entitled, in either case calculated in accordance with clause 4.3;

“Difference Debit” means an amount by which the Settlement Account of a Party is debited or, where clause 4.2 applies, an amount which a Party owes to the other Party, in either case calculated in accordance with clause 4.3;

“Difference Debits and Credits” means Difference Debits and Difference Credits;

“Difference Payments” means the payments to be made to or from the Market Company or, if clause 4.2 applies, to be made between the Parties in settlement of Difference Debits and Credits;

“Energy Market” means the Singapore wholesale electricity market operated by the Market Company under and in accordance with the Market Rules for the real-time trading of energy;

“Event of Default” means an event described in clause 8.2;

“Force Majeure Adjustment Event” means an event described in clause 7.2;

“Generation Capacity” means the aggregate licensed capacity of all Generating Units of the Holder;

“Generation Installed Capacity” means, for a Generating Unit, the maximum sustainable generation capacity that is in commercial operation, and which is specified in the ‘Standing Offer’ data for the Generating Unit;

“Generating Unit” means a generating facility, a generating station or both;

“Good Utility Practice” means those standards, practices, methods and procedures conforming to all relevant applicable safety and legal requirements that would be applied and followed by a person seeking in good faith to perform its contractual and legal obligations and, in so doing and in the general conduct of its undertaking, exercising that degree of skill, diligence, prudence and foresight which would reasonably or ordinarily be expected from a skilled and experienced person complying with all applicable laws engaged in the same type of undertaking under the same or similar circumstances and conditions;

“Half Hour” means a period of thirty (30) consecutive minutes commencing on the hour or at thirty minutes past the hour;

“Hedge” means a contract for difference entered or to be entered into between the Parties for a particular Half Hour and at the Hedge Price and for the Hedge Quantity related thereto, each as specified in Schedule A;

“Hedge Limits” means the overall limit on the total amount of any Hedge Quantities for any given Half Hour or any given Quarter, as the case may be, that the Holder or a Counter Party, as the case may be, is entitled or required to hold as determined from time to time by the Issuer using a methodology specified by Authority;

“Hedge Price” means the price associated with a Hedge Quantity for each Half Hour as specified in Schedule A;

“Hedge Quantity” means the hedge quantity allocated to the Holder for each Half Hour as specified in Schedule A;

“injection” means to inject electricity into the Singapore Transmission System;

“Market Power” means, in the opinion of the Authority, likely to possess the actual or the potential ability to distort prices or competition in the Energy Market;

“Market Company” means the Energy Market Company (EMC), which holds an electricity licence authorising it to operate any wholesale electricity market;

“Market Energy Price” or “MEP” means, in respect of any Half Hour, the Market Energy Price for that Half Hour calculated in accordance with the Market Rules.

“Market Rules” means the rules made or modified under section 46 of the Act;

“month” means a period beginning in one calendar month and ending in the next calendar month on the day numerically corresponding to the day of the calendar month on which it started, provided that (i) if the period stated on the last Business Day in a calendar month or if there is no such numerically corresponding day, it shall end on the last Business Day in such next calendar month and (ii) if such numerically corresponding day is not a Business Day, the period shall end on the next following Business Day in the same calendar month but if there is no such Business Day it shall end on the preceding Business Day and “months” and “monthly” shall be construed accordingly;

“National Holiday” means any day other than a Saturday or Sunday on which banks are authorised or required to be closed in Singapore;

“Party” means a party to this Contract and “Parties” means the Holder and the Issuer;

“Power System Operator” means the Authority acting in its capacity as the person responsible for ensuring the security of supply of electricity to consumers and arranging for the secure operation of the transmission system as described in subsection 3(3)(e) of the Act;

“Quarter” means a period of three months commencing on the first day of any one of the following months in any year: January, April, July and October and ending on the date immediately preceding the first day of the following Quarter;

“Revised Price” means, in respect of a Half Hour, the price of energy used for settlement purposes in the Energy Market for that Half Hour as determined by the Market Company in accordance with sections 10.2.4, 10.2.5, 10.2.7, 10.2.8 and 10.2.9 of Chapter 6 of the Market Rules on the basis of revised values rather than on the basis of the otherwise applicable real-time pricing schedule, as that term is defined in the Market Rules;

“Standing Offer” means an offer required to be submitted on behalf of a generation registered facility in accordance with the Market Rules;

“Settlement Account” means an accounting balance maintained by the Market Company in respect of a Party for settlement purposes under and in accordance with the Market Rules;

“Term” has the meaning given in clause 2.1;

“Transmission System” means the system of interconnected electric lines owned by a transmission licensee for the purpose of conveying electricity;

“Vesting Contract Reference Price” or VCRP means, in respect of any Half Hour, the Vesting Contract Reference Price for that Half Hour calculated in accordance with the applicable provisions of Chapter 7 of the Market Rules.

“Vesting Regime Commencement Date” means the date on which the Vesting Regime commences and this agreement comes into operation;

“Vesting Regime” means all those agreements and arrangements referred to in Recital B.

"Vesting Contract" means a contract for differences entered into between the Issuer and a Generation Licensee as part of the Vesting Regime, including this Contract.

1.3 CONSTRUCTION

1.3.1 Interpretation

In this Contract, unless the context otherwise requires:

- (a) words importing the singular include the plural and vice versa;
- (b) words importing a gender include any gender;
- (c) when capitalised, other parts of speech and grammatical forms of a word or phrase defined in this Contract have a corresponding meaning;
- (d) any expression importing a natural person includes any company, partnership, trust, joint venture, association, corporation or other private or public body corporate, and any government agency or body politic or collegiate;
- (e) a reference to a thing includes a part of that thing;
- (f) a reference to an article or to a clause, sub-clause, section, subsection, provision, condition, part or schedule is to an article or a clause, sub-clause section, subsection, provision, condition, part or schedule of this Contract;
- (g) a reference to any statute, subsidiary legislation, proclamation, ordinance, by-law, resolution, rule, order, supplements, gazette notification or directive includes all statutes, subsidiary legislation, proclamations, ordinances, by-laws, resolutions, rules, orders, supplements, gazette notifications or directives modifying, consolidating, re-enacting, extending or replacing it and a reference to a statute includes all subsidiary legislation, proclamations, ordinances, by-laws, resolutions, rules, orders, supplements, gazette notifications and directives of a legislative nature issued under that statute;
- (h) a reference to a document or a provision of a document, including this Contract and the Market Rules or a provision of this Contract or the Market Rules, includes an amendment of or supplement to, or replace-

ment or novation of, that document or that provision of that document, as well as any exhibit, schedule, appendix or other annexure thereto;

- (i) a reference to a person includes that person's heirs, executors, administrators, successors, substitutes (including persons taking by novation) and permitted assigns;
- (j) a reference to a person (including an institute, association or authority), whether statutory or not, which ceases to exist or whose functions are transferred to another person is a reference to the person that replaces it or that substantially succeeds to its functions, powers or duties;
- (k) a reference to clauses or sections of a document, including this Contract and the Market Rules, separated by the word "to" (i.e., "sections 1.1 to 1.4") shall be a reference to the clauses or sections inclusively;
- (l) a reference to the word "including" means "including but not limited to"; and
- (m) a reference to the Market Rules includes a reference to:
 - (i) any Market Manual adopted by the Board of Directors of the Market Company and approved by the Authority pursuant to section 8 of Chapter 1 of the Market Rules; and
 - (ii) the System Operation Manual adopted by the Power System Operator, as that term is defined in the Market Rules, pursuant to section 9 of Chapter 1 of the Market Rules.

1.3.2 Headings

The division of this Contract into articles and clauses and the insertion of headings are for convenience of reference only and shall not affect the interpretation of this Contract, nor shall they be construed as indicating that all of the provisions of this Contract relating to any particular topic are to be found in any particular article, clause, sub-clause, section, subsection, provision, condition, part or schedule.

1.3.3 Currency

All monetary amounts referred to in this Contract, including in respect of Hedge Prices, are denominated in Singapore dollars.

2 TERM

2.1 TERM

Subject to clause 2.2, this Contract shall come into force on the Vesting Regime Commencement Date and shall remain in full force and effect until terminated in accordance with Article 8.

2.2 EFFECT EVEN IF NO HEDGE QUANTITIES ALLOCATED IN INTERVENING PERIOD

Subject to Article 8, this Contract shall apply to all Hedge Quantities until settlement has been effected in respect of all resulting Difference Debits and Credits notwithstanding that there may be periods of time after the Vesting Regime Commencement Date when the Holder holds no Hedge Quantities.

3 ALLOCATION OF HEDGE QUANTITIES AND FIXING OF HEDGE PRICES

3.1 OBLIGATION TO ALLOCATE AND OFFER HEDGE QUANTITIES

The Issuer shall allocate Hedge Quantities to the Holder in accordance with the provisions of this Article 3 until this Contract is terminated in accordance with Article 8.

3.2 OBLIGATION TO ACCEPT HEDGE QUANTITIES

3.2.1 Where Holder Designated as having Market Power

- (a) If (i) by notice to the Issuer and the Holder or (ii) under the Holder's Electricity Licence, the Holder has been designated by the Authority as having Market Power, the Holder shall accept all Hedge Quantities allocated to it by the Issuer. Nothing in this clause shall be construed as limiting the right of the Holder to transfer any such Hedge Quantities to a Counter Party in accordance with clause 6.2.
- (b) The Parties acknowledge and agree that the Authority may exercise its right to designate the Holder as having Market Power from time to time as the Authority, in its sole discretion, determines appropriate based on such criteria as the Authority, in its sole discretion, determines appropriate, and the Parties agree to be bound by any such designation for the purposes of this Contract.

3.2.2 Where Holder Not Designated as having Market Power

Where a Holder is not the subject of a designation by the Authority pursuant to clause 3.2.1(a), the Holder by electing to enter into this Contract is thereafter bound to accept the Hedge Quantities allocated to it by the Issuer for the term of the Contract. Nothing in this clause shall be construed as limiting the right of the Holder to transfer any such Hedge Quantities to a Counter Party in accordance with clause 6.2.

3.3 ALLOCATION OF HEDGE QUANTITIES

3.3.1 Initial Allocation

The Issuer shall initially allocate to the Holder the Hedge described in Schedule A. Such Hedge Quantities and Hedge Prices shall have effect for the period commencing on the Vesting Regime Commencement Date and ending on the date that is the day immediately preceding the first day of the second Quarter following the Vesting Regime Commencement Date.

3.3.2 Quarterly Hedge Schedule

Subject to clause 3.6.2, not later than thirty (30) days before the beginning of the second Quarter following the Vesting Regime Commencement Date and of each Quarter thereafter, the Issuer shall:

- (i) in accordance with clauses 3.4 and 3.5, calculate the Hedge Quantities to be allocated to the Holder for such Quarter and the Hedge Prices associated with such Hedge Quantities; and
- (ii) produce and provide to the Holder a revised Schedule A containing the new Hedge Quantities and associated Hedge Prices applicable for the relevant Quarter.

3.4 CALCULATION OF HEDGE QUANTITIES

The Issuer shall calculate and determine the Hedge Quantities to be allocated to the Holder under clause 3.3.2 in accordance with the procedure, algorithm and parameters described in Schedule B.

3.5 CALCULATION OF HEDGE PRICES

The Issuer shall calculate and determine the Hedge Price associated with each Hedge Quantity allocated to the Holder under clause 3.3.2 in accordance with the procedure, algorithm and parameters described in Schedule C.

3.6 APPLICATION OF COMPUTER SOFTWARE

3.6.1 Software Audit

In the event that the Issuer, in its sole discretion, has chosen to apply the algorithms referred to in either or both of clause 3.4 and 3.5 by means of computer software, the Issuer shall make available at the request of a Holder a copy of the most recent independent auditors report validating that the software is consistent with the formulations defined in Schedules B and C. Such an audit will be undertaken at intervals not exceeding eighteen (18) calendar months, with the first audit to be undertaken within sixty (60) Business Days of the day on which the computer software

is first used for the above purposes. The Holder shall bear the Issuer's costs in obtaining any independent auditors reports which are in addition to those required to be obtained by the Issuer at the intervals described above.

3.6.2 Contingency Plan

The Holder acknowledges that the computer hardware and/or software which may be used by the Issuer from time to time to perform the calculations and allocations as required under this Article 3 may be subject to interruptions or other contingent events which may affect the ability of the Issuer to perform its obligations hereunder. If such interruption or contingency event occurs, the Issuer shall notify the Holder of such occurrence and use all reasonable efforts to:

- (a) perform its obligations under this Article 3 in the manner and within the timeframes prescribed in the Contingency Plan ;
- (b) procure the performance by other parties identified in the Contingency Plan of their respective obligations within the timeframes prescribed therein; and
- (c) restore the affected computer systems back to normal operations as soon as practicable.

3.7 ACKNOWLEDGEMENT OF THE NEED FOR JUDGEMENT AND BINDING NATURE OF CALCULATIONS

The Holder acknowledges and agrees that the calculation of Hedge Quantities and of associated Hedge Prices pursuant to clauses 3.4 and 3.5 involves the exercise of judgement by the Issuer. The Holder therefore agrees that it shall be bound by any such calculation and any such calculation shall not be revised pursuant to any dispute process unless the Issuer in making the calculation:

- (a) has acted otherwise than in good faith; or
- (b) has exercised judgement in effecting such calculation in a manner that is in error; or
- (c) has exercised judgement in effecting such calculation in a manner that is significantly different from the manner in which such judgement has previously been exercised by the Issuer and no reasonable justification exists for such difference.

3.8 NO RIGHT TO DEMAND ENTITLEMENT

Nothing in this Contract shall be construed as creating or be deemed to create for the benefit of the Holder or any Counter Party an entitlement to any allocation of Hedge Quantities and if, in performing the calculations referred to in clause 3.4 the Issuer determines that no allocation of Hedge Quantities should be made to the Holder in respect of a given Quarter, the applicable Schedule A produced and provided to the Holder shall indicate that the Hedge Quantities for such Quarter have been established at zero.

3.9 ISSUER TO ALLOCATE AND REALLOCATE HEDGE QUANTITIES TO MEET REQUIREMENTS OF THE AUTHORITY

- (a) Notwithstanding any other provision of this contract, the Issuer shall comply, and the Holder acknowledges and agrees that the Issuer is required to comply, with any direction issued to it by the Authority in respect of the allocation or re-allocation of Hedge Quantities. The Holder shall accept such allocation or re-allocation of Hedge Quantities (as the case may be) and acknowledges that it has no right of action against the Issuer in respect to the same.
- (b) The Issuer shall, if notified as such by the Holder in writing at least sixty (60) days prior to the commencement of the next quarter, allocate Hedge Quantities to all Holders in accordance with clause 3.4 taking into consideration any planned changes during the quarter of the Holders Generation Installed Capacity resulting from all or part of a Generation Unit/s being brought into or taken out of normal operation during the quarter. Where such notification is provided, all Hedge Quantities following the declared time and date of the planned commencement/retirement of the generation unit/s shall be adjusted taking the capacity change into consideration. For the purposes of this clause, Generation Installed Capacity will be considered to have changed if all or part of a Generating Unit is expected to be continuously available or unavailable, as the case may be, for normal despatch for a period of at least six calendar months.
- (c) Where the Issuer has been required to allocate or re-allocate Hedge Quantities in accordance with 3.9(a) or 3.9(b) the Issuer shall provide the affected Holder/s with a copy of any such direction as soon as practicable following receipt thereof by the Issuer.

3.10 NO PHYSICAL ENTITLEMENT

The Parties acknowledge and agree that this Contract is in the nature of a financial contract for differences and that nothing in this Contract is intended to give, or shall give, any person any right to the physical supply or delivery of electricity, nor shall it create or give any right to the Holder to supply electricity to any person.

3.11 GENERATION CAPACITY HEDGED

For the purposes of calculating Hedge Quantities under Schedule B of this Contract, a Holder's maximum allocation of Hedge Quantities shall be limited to either:

- (a) the Holder's total Generation Installed Capacity, up to a maximum of the Holder's Generation Capacity on the Vesting Regime Commencement Date, including capacity approved by the Authority but not yet commissioned, or;
- (b) the Holder's total Generation Installed Capacity up to a reduced Generation Capacity where the Holder's licensed capacity is reduced during the term of the agreement for any reason, including the withdrawal or expiry of the Authorities approval to build or acquire new Generation Capacity.

3.12 DISPUTES ON ACCURACY OF CALCULATIONS ON HEDGE QUANTITIES AND HEDGE PRICE

- (a) If the Holder disagrees with any calculation of Hedge Quantities or associated Hedge Prices allocated to the Holder pursuant to clauses 3.4 and 3.5 the Holder shall provide the Issuer with a notice of disagreement in the format annexed herein as Appendix A stating clearly the nature of disagreement with supporting material and a proposed resolution within five (5) Business Days after receipt of the relevant Schedule A.
- (b) The Issuer shall do one of the followings within five (5) Business days after receipt of the Holder's notice of disagreement:
 - (i) If the Issuer concurs fully with the Holder's proposed adjustment or correction, it shall revise the Schedule A accordingly and promptly issue to the Holder a revised Schedule A;
 - (ii) If the Issuer does not concur with the Holder's proposed adjustment or correction, it shall notify the Holder in writing that the proposed adjustment is now a dispute between the Parties.
- (c) If, following the issue of the Schedule A described in clause 3.3.1 or the revised Schedule A described in clause 3.3.2, the Issuer determines that an administrative or other inadvertent error was made in preparing the schedule, the Issuer shall notify the Holder of the error and issue a revised Schedule A within 10 Business Days of the original issue date.
- (d) The Holder shall do one of the followings within five (5) Business days after receipt of the Issuer's error notice and revised Schedule A:
 - (i) If the Holder concurs with the Issuer that an error was made, it shall notify the Issuer of its acceptance of the revised Schedule A;
 - (ii) If the Holder does not concur with the Issuer that an error was made, it shall notify the Issuer in writing that the matter is now a dispute between the Parties.
- (e) Any such dispute referred to in clause 3.12(b)(ii) or clause 3.12 (d) (ii) shall be resolved using the dispute resolution provisions of Article 10, subject to the provisions of clause 3.7.
- (f) Pending resolution of any such dispute, the calculations by the Issuer pursuant to clauses 3.4 and 3.5 shall apply subject to clause 3.12(g).
- (g) If on resolution of a dispute referred to in clause 3.12(b)(ii) or clause 3.12(d)(ii), it is agreed or determined that any Hedge Quantities and/or Hedge Prices calculated pursuant to clauses 3.4 and 3.5 are to be revised, the Issuer shall promptly issue to the Holder a revised Schedule A for the relevant period to reflect the revisions to the Hedge Quantities or Hedge Prices as agreed or determined and such shall become the Schedule A for the relevant period.

- (h) If the Parties have settled any Difference Debits or Credits prior to the resolution of any dispute on the basis of any Hedge Quantities or Hedge Prices which are subsequently agreed or determined as requiring revision, then the Parties shall make adjusting payments, as necessary, for any under or overpayment, including interest, which shall accrue at the Default Rate from the date on which it is agreed or determined that the payment should have been paid until the date payment is received by the Party entitled to the adjusting payment. Such interest shall be calculated daily but compounded at the end of each month for any such amount remains unpaid.

4 SETTLEMENT

4.1 SETTLEMENT THROUGH MARKET COMPANY

- (a) Subject to clause 4.2, settlement in respect of any Difference Debits and Credits and associated Difference Payments shall be effected through the Market Company in accordance with the applicable provisions of Chapter 7 of the Market Rules.
- (b) The Issuer shall:
 - (i) promptly following execution of this Contract, provide an executed copy of this Contract to the Market Company, and
 - (ii) provide to the Market Company a copy of any Schedule A produced by the Issuer promptly following the provision thereof to the Holder under this Contract, including without limitation any revised Schedule A produced under clause 3.12,so as to enable the Market Company to effect settlement in accordance with clause 4.1(a).
- (c) Each Party shall at the request of the Market Company, provide the Market Company with such additional information or documentation as may be required to enable the Market Company to effect settlement in accordance with clause 4.1(a)
- (d) A payment made to the Market Company for the settlement of Difference Debits shall be deemed to have discharged the financial obligations of the relevant Party in respect of the Hedge for which payment was made.

4.2 ALTERNATIVE SETTLEMENT

Where:

- (a) the Holder is not or ceases to be registered by the Market Company as a Market Participant under the Market Rules;
- (b) the Issuer is not or ceases to be authorized by the Market Company to participate in the Energy Market under the Market Rules;

- (c) the Market Rules do not or cease to contain provisions relating or applicable to the settlement of Difference Debits and Credits or associated Difference Payments; or
- (d) the Market Company becomes unable to effect settlement of Difference Debits and Credits or associated Difference Payments for any reason and so notifies the Parties,

the Parties shall settle all Difference Debits and Credits and associated Difference Payments directly amongst themselves on such terms as may be agreed by the Parties or, failing such agreement, by means of cash payments payable on the day that is twenty-five (25) Business Days after the end of each calendar month. Each such cash payment shall reflect the Difference Payments associated with all Difference Debits and Credits calculated for each Half Hour in the relevant calendar month.

4.3 CALCULATION AND APPLICATION OF DIFFERENCE DEBITS AND CREDITS

Subject to the application of Article 5:

- (a) For each and every Half Hour that the Vesting Contract Reference Price exceeds the Hedge Price, the Issuer shall be entitled to receive a Difference Credit and the Holder shall be required to incur (or where clause 4.2 applies, shall owe to the Issuer) a Difference Debit for that Half Hour, calculated as follows:

$$A_H = (VCRP_H - HP_H) * HQ_H$$

where A_H = the amount calculated for the applicable Half Hour H

$VCRP_H$ = the Vesting Contract Reference Price for the Holder for Half Hour H

HP_H = the Hedge Price for Half Hour H

HQ_H = the Hedge Quantity allocated to the Holder for Half Hour H

- (b) For each and every Half Hour that the Hedge Price exceeds the Vesting Contract Reference Price, the Holder shall be entitled to receive a Difference Credit and the Issuer shall be required to incur (or where clause 4.2 applies, shall owe to the Holder) a Difference Debit for that Half Hour, calculated as follows:

$$A_H = (HP_H - VCRP_H) * HQ_H$$

where A_H = the amount calculated for the applicable Half Hour H

$VCRP_H$ = the Vesting Contract Reference Price for the Holder for Half Hour H

HP_H = the Hedge Price for Half Hour H

HQ_H = the Hedge Quantity allocated to the Holder for Half Hour
H

- (c) Each Difference Credit and Difference Debit calculated in accordance with clause 4.3(a) or 4.3(b) shall, where clause 4.1 applies, be reflected as a corresponding credit or debit in the Settlement Account of the applicable Party in accordance with the applicable provisions of Chapter 7 of the Market Rules.

4.4 DIFFERENCE PAYMENTS

- (a) Where clause 4.1 applies:
- (i) a Party whose net balance of the Difference Debits and Credits allocated to it under this Contract is negative shall make a Difference Payment to the Market Company in the amount of such negative net balance or such other amount as may be determined by the application of clause 4.5; and
 - (ii) a Party whose net balance of the Difference Debits and Credits allocated to it under this Contract is positive shall be entitled to receive from the Market Company a Difference Payment in the amount of such positive balance or such other amount as may be determined by the application of clause 4.5,

in the manner and within the time required by the applicable provisions of Chapter 7 of the Market Rules.

- (b) Where clause 4.2 applies, a Party whose net balance of the Difference Debits and Credits allocated to it under this Contract is negative shall make a Difference Payment to the other Party in accordance with clause 4.2.
- (c) All settlement payments to be made shall be in Singapore dollars.

4.5 SET OFF

Where clause 4.1 applies, the Market Company may,

- (a) where a Party has a sufficient positive balance in its Settlement Account at the time at which a Difference Payment is required to be made by such Party, set off the amount of such Difference Payment or a portion thereof against such positive balance in lieu of requiring the payment, in whole or in part as the case may be, of the Difference Payment.
- (b) where a Party has a negative balance in its Settlement Account at the time at which it is entitled to receive a Difference Payment, set off the amount of such Difference Payment or a portion thereof against such negative balance in lieu of the receipt by such Party of the Difference Payment in whole or in part, as the case may be.

4.6 TAXES

It is expressly understood and agreed by the Parties that, as the Hedge Quantities and Hedge Prices are calculated each Quarter, any introduction of, or a change in, any applicable law, regulation or regulatory requirement or in its interpretation by the Government of Singapore or any governmental or quasi-governmental agency that changes the basis of taxation of any component of the Hedge Price or of the Hedge Price itself which take effect other than at the start of a Quarter shall not give rise to a dispute or a demand for the recalculation of or any adjustment to the Hedge Prices contained in the then current Schedule A but shall be reflected in the Hedge Prices calculated by the Issuer for the Quarter immediately following that in which the change in taxes becomes applicable.

- (a) The Parties acknowledge and agree that each Party shall bear the costs of all taxes and government fees, levies or charges applicable to any transactions under this Contract which are imposed upon it by applicable law or the Market Rules and shall make any payments on account of such taxes and government fees, levies or charges in the manner and at the time required by applicable law or the Market Rules. A Party required by applicable law or the Market Rules to make payments on account of such taxes or government fees, levies or charges shall indemnify and hold harmless the other Party in respect of all claims, losses, costs, liabilities, obligations, actions, judgments, suits, expenses, disbursements or damages incurred, suffered, sustained or required to be paid, directly or indirectly, by, or sought to be imposed upon, the other Party as a result of the failure by the Party to make such payments or to make such payments within the time and in the manner required by applicable law or the Market Rules.
- (b) The Parties acknowledge and agree that no change in the amount of any taxes or government fees, levies or charges applicable to any transactions under this Contract shall give rise to any right of a Party to dispute the calculation of any Hedge Price or to request the re-calculation of any Hedge Price under this Contract.

4.7 DEFAULT INTEREST

- (a) Subject to clause 4.7(b), all amounts payable by one Party to the other under this Contract, including any Difference Payment settled in accordance with clause 4.1, which remain unpaid after the due date for payment (or the date specified in any court judgment) (an “unpaid amount”) is due shall accrue interest at the Default Rate (“Default Interest”) from the due date (or the date specified in any court judgment) until the date payment is received by the Party entitled to receipt of the payment. Default Interest shall be calculated daily but compounded at the end of each month that any unpaid amount is outstanding and shall accrue after as well as before judgement, if any. Default Interest shall be paid directly by the defaulting Party to the other Party, regardless of whether settlement is being effected under clause 4.1 or under clause 4.2. All legal costs and expenses reasonably incurred by a Party in collecting or attempting to collect any unpaid amount shall be payable by the defaulting Party and the defaulting Party shall indemnify the other Party in respect of all such costs and expenses.

- (b) Where clause 4.1 applies, no Party shall be required to pay Default Interest under clause 4.7(a) where the failure by the other Party to receive payment is the result of the failure by the Market Company to make payment to that other Party on the date or in the manner required by the Market Rules other than by reason of the failure by the non-receiving Party to make payment to the Market Company of a Difference Payment.

4.8 DISPUTES ON ACCURACY OF CALCULATIONS

- (a) Where clause 4.1 applies, if a Party wishes to dispute the accuracy of any Difference Debit or Credit or of any Difference Payment, the Party shall notify the other Party of the dispute and shall pursue the matter with the Market Company in accordance with section 3 of Chapter 3 of the Market Rules. The other Party shall not unreasonably impede resolution of the dispute by the disputing Party and the Market Company, and shall, at the request and expense of the disputing Party, provide such assistance as the disputing Party may reasonably require for purposes of the timely resolution of the dispute
- (b) Where clause 4.2 applies, any disputes arising in respect of the accuracy of any Difference Debit or Credit or of any Difference Payment shall be resolved using the dispute resolution provisions of Article 10.

4.9 SETTLEMENT NOTWITHSTANDING DISPUTE

- (a) Initiation of a dispute resolution process under clause 4.8 shall not affect any obligation to make payment under this Contract in respect of the disputed amount and neither Party shall withhold or refuse settlement in respect of any such disputed amount pending completion of the dispute resolution process.
- (b) If, on resolution of a dispute referred to in clause 4.8, it is agreed or determined that there is an amount due from one Party to the other Party, then the owing Party shall make payment through the Market Company to the other Party or directly amongst themselves as the case may be, of such amount. Such amount shall attract interest at the Default Rate from the date on which it is agreed or determined that the amount should have been paid until the date payment is received by the Party entitled to receipt of the payment. Such interest shall be calculated daily but compounded at the end of each month that any amount remains unpaid and shall accrue after as well as before judgement, if any.
- (c) If, on resolution of a dispute referred to in clause 4.8(a), it is agreed or determined that there is an amount due from one Party to the Market Company, then the owing Party shall make payment to the Market Company within the time and in such manner as may be required by all applicable provisions of the Market Rules, if any, or by the terms of the agreement or determination.

5 ABNORMAL MARKET ENERGY PRICES

5.1 REVISED PRICING

- (a) The Parties acknowledge and agree that, in the event that the Market Company resorts to the application of Revised Prices under the Market Rules in lieu of the calculation of the Market Energy Price, such Revised Prices shall, for the purpose of the calculation of Vesting Contract Reference Price in accordance with the applicable provisions of Chapter 7 of the Market Rules, be used in substitution of the normally calculated Market Energy Price as if and as though they were the Market Energy Price.
- (b) Clause 5.2 shall not apply in circumstances where the Market Company resorts to Revised Prices, which shall be dealt with in the manner required by clause 5.1(a).

5.2 NEGOTIATION OF CHANGE OF BASIS

- (a) If:
 - (i) the basis on which the Vesting Contract Reference Price is calculated under the Market Rules is changed and that change could be expected to lead directly to Vesting Contract Reference Prices over a three month period, which are materially different from the Vesting Contract Reference Prices that would have applied in that period but for the change; or
 - (ii) the Vesting Contract Reference Price ceases to be calculated under the Market Rules, either Party may notify the other Party and the Authority that it wishes to renegotiate the basis for calculating Difference Debits and Credits. Upon such notification, the Issuer shall, in consultation with the Authority and the Counter Parties, negotiate in good faith with the Holder to agree such a revised basis (the “Revised Calculation”) in order that neither Parties nor the Counter Parties are materially financially advantaged or disadvantaged. For the avoidance of doubt, the Revised Calculation shall be subject to the final approval of the Authority.
- (b) Pending agreement of a Revised Calculation, the basis for calculating Difference Debits and Credits pursuant to clause 4.3 shall apply subject to clause 5.2(c)
- (c) Upon agreement of the Parties of a Revised Calculation for calculating Difference Debits and Credits, such Revised Calculation shall be implemented with effect from the date of occurrence of the event under 5.2(a)(i) or 5.2(a)(ii) (as applicable) or as otherwise agreed between the Parties.

- (d) if the parties are unable to agree upon a revised calculation within one month of the giving of the notice mentioned above, either party may refer the matter to the authority for determination, whose decision shall be final. If the parties are able to agree upon the revised calculation mentioned above, the issuer shall so notify the authority and, where clause 4.1 applies, the market company.
- (e) if the parties have settled any difference debits or credits prior to the agreement on the revised calculation, then the parties shall make adjusting payments, as necessary, for any under or overpayment.

6 TRADING AND ASSIGNABILITY

6.1 ISSUER NOT TO ASSIGN OR TRADE

- (a) The Issuer shall not assign, transfer or novate, whether absolutely, by way of security or otherwise:
 - (i) all or any part of its rights or obligations under this Contract; or
 - (ii) any right, entitlement or obligation to receive, incur or pay any Difference Debit or Credit or Difference Payment in respect of a Hedge Quantity allocated to the Holder hereunder.
- (b) For greater certainty, the Issuer shall not:
 - (i) repurchase or allocate or reallocate to itself;
 - (ii) seek, arrange for or procure the repurchase by it or the allocation or reallocation to it; or
 - (iii) enter into any arrangement which is intended to have or would have the effect of the repurchase by it or the allocation or reallocation to it,of any Hedge Quantities.

6.2 HOLDER MAY ASSIGN OR TRADE TO SPECIFIC ENTITIES

- (a) Subject to clause 6.2(b), the Holder shall not assign, transfer or novate, whether absolutely, by way of security or otherwise:
 - (i) all or any part of its rights or obligations under this Contract; or
 - (ii) any right, entitlement or obligation to receive, incur or pay any Difference Debit or Credit or Difference Payment in respect of a Hedge Quantity allocated to the Holder hereunder.
- (b) The Holder may, with the prior approval of the Issuer, which prior approval shall not be unreasonably withheld, assign, transfer or novate its right, entitlement or obligation to receive, incur or pay any Difference Debit or Credit or Difference Payment in respect of a Hedge Quantity allocated to the Holder hereunder to a Counter Party provided that:

- (i) such assignment, transfer or novation does not cause such Counter Party to exceed the Hedge Limits applicable to that Counter Party; and
- (ii) such Counter Party enters into such agreement as may reasonably be required by the Issuer to ensure that the Counter Party accepts and complies with all of the obligations of the Holder associated with the right, entitlement or obligation that is the subject of the assignment, transfer or novation.

7 FORCE MAJEURE

7.1 FORCE MAJEURE

- (a) “Force Majeure” means any event, circumstance, omission or combination of them which is beyond the control of the Party affected by it and the adverse effects of which could not have been reasonably prevented, overcome or remedied in whole or in part by the Party affected through the exercise of Good Utility Practice.
- (b) Without limiting the generality of clause 7.1(a), each of the following is an example of Force Majeure provided it satisfies the definition in clause 7.1(a):
 - (i) any Act of God, strikes, lockouts, other labour disturbances, acts of the public enemy, wars, blockades, landslides, lightning, geomagnetically induced currents, earthquakes, fires, storms, floods and other natural catastrophes; or
 - (ii) civil disturbances, sabotage or vandalism; or
 - (iii) restraints by court order or public authority, the binding order of any court or governmental or quasi-governmental authority or action or non-action by, or inability to obtain the necessary authorisations from, any governmental or quasi-governmental agency or authority other than as a result of a violation by the Party affected by Force Majeure of an authorisation, permit, licence or applicable law; or
 - (iv) any event or circumstance of force majeure which excuses performance by a Party under a connection agreement which that Party may have with a person that has an Electricity Licence authorising it to transmit electricity; or
 - (v) a partial or entire failure of, or reduction in the transmission capability of, the Transmission System for any reason.
 - (vi) Any event that prevents any one or more suppliers from supplying Primary Fuel; or insufficient quantities of Primary Fuel being made available, to all or any of the Holder’s Generating Units. For the purpose of this clause, “Primary Fuel”, in respect of a Generating Unit, shall be the fuel identified as such in Schedule E for that Generating Unit. The Holder shall notify the Issuer, in writing at least sixty (60) days prior to the commencement of the next quarter, of any changes to Schedule E.

7.2 FORCE MAJEURE ADJUSTMENT EVENTS

“Force Majeure Adjustment Event” means:

- (a) In the case of Force Majeure affecting the Holder, Force Majeure that:
 - (i) prevents the injection by the Holder, through one or more of its Generating Units, of electricity generated using its Primary Fuel onto the Transmission System; or
 - (ii) has the effect of reducing or removing the ability of the Holder to inject, through one or more of its Generating Units, electricity generated using its Primary Fuel onto the Transmission System,

for a period of more than one day in an amount, in megawatt hours, that is equivalent to 25% or more of the Hedge Quantities contained in the then current Schedule A for that period.
- (b) In the case of Force Majeure affecting the Issuer, Force Majeure that has the effect of reducing or removing its ability to uplift electricity by more than 25% of the Aggregate Hedge Quantity to be required to be met in that relevant Half Hour.

7.3 ADJUSTMENT

- (a) Where a Party is affected by a Force Majeure Adjustment Event, the Hedge Quantities that would otherwise apply for the period during which the Force Majeure Adjustment Event is in effect shall be reduced on a pro rata basis by an amount that reflects the degree to which the Party affected by the Force Majeure Adjustment Event has had its ability to inject or uplift electricity, as the case may be, referred to in clause 7.2 prevented, reduced or removed.
- (b) The Issuer shall produce and provide to the Holder a temporary revised Schedule A that reflects the reduction referred to in clause 7.3(a), which temporary revised Schedule A shall apply until such time as the Party affected by the Force Majeure Adjustment Event gives to the other Party the notice referred to in clause 7.4(b) in respect of that Force Majeure Adjustment Event, at which time the full amount of the Hedge Quantities in the applicable Schedule A shall resume.
- (c) Where clause 4.1 applies, the Issuer shall promptly notify the Market Company of the date on which the temporary revised Schedule A ceases to have effect in accordance with clause 7.3(b).

7.4 NOTICE

Where a Party is affected by a Force Majeure Adjustment Event, it shall give notice in the format annexed herein as Appendix B to the other Party and to the Authority:

- (a) of the invocation of the Force Majeure Adjustment Event as soon as reasonably practical but in any event within two (2) Business Days of the occurrence of the Force Majeure Adjustment Event, which notice shall include full particulars of the Force Majeure Adjustment Event and of the effect that such Force Majeure Adjustment Event is having including the date and time of occurrence and
- (b) of the cessation of the Force Majeure Adjustment Event within one (1) Business Day of the date of cessation.

7.5 MITIGATION OF FORCE MAJEURE

- (a) Where a Party is affected by a Force Majeure Adjustment Event, it shall:
 - (i) subject to clause 7.5(b), use all reasonable endeavours to mitigate or alleviate the effects of the Force Majeure Adjustment Event on its ability to inject or uplift electricity, as the case may be, as referred to in clause 7.2; and
 - (ii) continue to comply with its obligations under this Contract to the maximum extent reasonably possible.
- (b) The settlement of any strike, lockout or other labour disturbance constituting a Force Majeure Event shall be within the sole discretion of the Party involved in such strike, lockout or other labour disturbance and nothing in clause 7.5(a) shall require that Party to mitigate or alleviate the effects of such strike, lockout or other labour disturbance.

8 DEFAULT AND TERMINATION

8.1 TERMINATION ON REMOVAL OF MARKET POWER

Notwithstanding clause 8.8, where, after midnight of 31 December 2009, the Authority declares that the control of Market Power in the Energy Market is no longer necessary or the Authority determines that a Holder (other than a Holder which has executed this Contract pursuant to clause 3.2.2) no longer has Market Power, the Issuer shall, as soon as reasonably practicable, give notice to the Holder to terminate this Contract. Where notification has been issued by the Issuer, the Contract shall be terminated at 12 midnight on the 60th Business Day following the issue of such notification.

8.2 EVENTS OF DEFAULT

The following shall be Events of Default in respect of a Party:

- (a) Save in the case of a dispute in good faith, (i) if The Party fails to settle its obligations or liabilities with the Market Company or(ii) if the Party fails to make payment of an invoice duly rendered by the Market Company in settlement of any amounts owing under this Contract, or, if clause 4.2 applies, fails to make any payment then owing directly to the other Party , in each case

within two (2) Business Days of the date or period on or during which payment is required as determined in accordance with clause 4.2. The Party fails to comply with, observe or perform any obligation under this Contract, other than a settlement or payment obligation referred to in clause 8.2(a), unless excused by the application of Article 7, provided that, if the failure is capable of remedy, this clause shall not apply unless such failure has not, in the reasonable opinion of the non-defaulting Party, been remedied within ten (10) Business Days of notice of the failure by the non-defaulting Party to the other Party;

- (b) The Party is unable to pay its debts as they fall due or is presumed pursuant to section 254(2) of the Companies Act (Cap. 50) to be insolvent or unable to pay its debts as they fall due or if the Party is placed in liquidation;
- (c) Proceedings are initiated under any applicable bankruptcy, reorganisation, composition or insolvency law against the Party, provided that such proceedings have not been discharged or stayed within ten (10) Business Days, or an administrator or a receiver is appointed in respect of all or any part of the undertaking or any property, assets or revenues of the Party;
- (d) The Party enters into or endeavours to enter into any composition, assignment or other arrangement with or to the benefit of its creditors; or
- (e) An application is made for the winding up or dissolution of the Party, steps are taken to pass a resolution for the winding up or dissolution of the Party or the Party is wound up or dissolved unless the winding up or dissolution notice is discharged.

8.3 RIGHT TO TERMINATE

At any time following an Event of Default and while the Event of Default remains unremedied, the Party not in default shall be entitled to give notice of termination of this Contract to the Party in default. The Party not in default shall promptly provide a copy of any such notice to the Authority and, where clause 4.1 applies, to the Market Company.

8.4 ISSUER NOT TO GIVE NOTICE OF TERMINATION BEFORE CONSULTATION WITH AUTHORITY

Notwithstanding clause 8.3, the Issuer shall not give a notice of termination pursuant to clause 8.3 unless and until the Issuer has consulted with the Authority.

8.5 TERMINATION

This Contract shall terminate at midnight on the day of expiry of the relevant notice given in the following circumstances:

- (a) If, following the occurrence of an Event of Default in respect of a Party, the Party not in default has given not less than two (2) Business Days notice of termination in accordance with clause 8.3;

- (b) If a Party is unable to perform any provision hereof to an extent that is material by reason of any statute or directive of the Government or the Authority, other than as a result of a violation by the Party of an authorisation, permit, licence or applicable law, and that Party properly gives not less than five (5) Business Days notice of termination to the other Party,

provided that, before exercising the right of termination contained in clause 8. 5(b), the Parties shall first consult with each other in good faith to determine if there are any legal and practical bases on which the contractual arrangements evidenced by this Contract might continue.

8.6 CONSEQUENCES OF TERMINATION BY THE ISSUER

Where this Contract terminates upon expiry of a notice given by the Issuer pursuant to clause 8.5(a) (in respect of an Event of Default pursuant to clause 8.2 (a) or (b)) or as the result of non-performance pursuant to clause 8.5(b), the Issuer may, immediately and by notice to the Holder, cancel all of the remaining Hedge Quantities then held by the Holder.

8.7 CONSEQUENCES OF TERMINATION BY THE HOLDER

Where this Contract terminates upon expiry of a notice given by the Holder pursuant to clauses 8.5(a) or as the result of non-performance pursuant to clause 8.5(b), the Holder may, immediately and by notice to the Issuer, cancel all of the remaining Hedge Quantities then held by the Holder.

8.8 SURVIVING OBLIGATIONS

- (a) Clause 3.11, 7.3, Articles 4, 5 and 6 shall survive the termination of this Contract for any reason in respect of any Hedge Quantities held by the Holder in respect of which settlement is due but has not been effected prior to the effective date of termination.
- (b) Article 1, this clause 8.8 and Articles 9, 10 and 12 shall survive termination of this Contract for any reason.
- (c) Notwithstanding termination of this Contract for any reason, each Party shall remain liable in respect of all obligations and liabilities owed to the other Party that were incurred or arose under this Contract prior to the effective date of termination regardless of the date on which any claim relating thereto may be made, subject only to any applicable provisions of the *Limitation Act* (Cap. 163).

9 CONFIDENTIALITY

9.1 DISCLOSURE OF INFORMATION

The Parties hereby acknowledge and agree that, for the purpose of fostering competition in the Energy Market and of promoting trading in Hedge Quantities, and

in the interests of transparency at a time and for a period when there is an asymmetry in access to and knowledge of market information and a predisposition to the misuse of Market Power, subject to clause 9.2, the terms of this Contract may be disclosed by either Party.

9.2 CERTAIN SPECIFIC INFORMATION NOT TO BE DISCLOSED

Notwithstanding clause 9.1, the Issuer shall hold confidential and shall not disclose in any way to any third party without the prior written approval of the Holder, information acquired, received or produced by the Issuer in relation to the calculation of Hedge Quantities and of Hedge Prices pursuant to clauses 3.4 and 3.5 that could directly or indirectly affect the competitive position of the Holder, provided that the Issuer may, without such prior approval, disclose such information:

- (a) to the Authority;
- (b) to the Market Company to the extent reasonably required in order for the Market Company to effect settlement in accordance with clause 4.1 and upon obtaining a similar undertaking of confidentiality from the Market Company;
- (c) in any dispute resolution, litigation or legal proceeding of any kind arising out of or in connection with this Contract or otherwise in compliance with the order of any court of competent jurisdiction or any Government or governmental agency having jurisdiction over the Issuer; or
- (d) to the extent that such information has become generally available to the public other than as a result of an unauthorised disclosure by the Issuer or any employee, agent or contractor of the Issuer.

10 DISPUTE RESOLUTION

10.1 APPLICABLE DISPUTE RESOLUTION PROCESS

The provisions of section 3 of Chapter 3 of the Market Rules apply to any dispute arising under this Contract and are hereby incorporated by reference herein, with all references in such section to a Market Participant being deemed to be a reference to a Party.

10.2 ATTORNMENT

Subject to clause 10.1, each Party agrees:

- (a) that any action or proceeding relating to this Contract shall be brought in any court of competent jurisdiction in Singapore, and for that purpose that it hereby irrevocably and unconditionally submits to the jurisdiction of such Singapore court;
- (b) that it hereby irrevocably waives any right to, and will not, oppose any such Singapore action or proceeding on any jurisdictional basis, including *forum non conveniens*; and

- (c) not to oppose the enforcement against it in any other jurisdiction of any judgement or order duly obtained from a Singapore court as contemplated by this clause 10.2.

10.3 PERFORMANCE OF OBLIGATIONS TO CONTINUE

Pending resolution of any dispute arising under this Contract, the Parties shall continue to perform their respective obligations under this Contract, including any obligation that may be the subject matter of the dispute.

11 REPRESENTATIONS AND WARRANTIES

11.1 REPRESENTATIONS AND WARRANTIES OF THE HOLDER

The Holder hereby represents and warrants as follows to the Issuer, and acknowledges and confirms that the Issuer is relying on such representations and warranties without independent inquiry in entering into this Contract:

- (a) that it has all the necessary corporate or other power to enter into and perform its obligations under this Contract;
- (b) that the execution, delivery and performance of this Contract by it has been duly authorized by all necessary corporate, governmental and/or other action and does not (or would not with the giving of notice, the lapse of time or the happening of any other event or condition) result in a violation or breach of or a default under or give rise to a right of termination, greater rights or increased costs, modification or cancellation or the acceleration of any obligation under (i) any of its constituent or by-law instruments; (ii) any contracts or instruments to which it is a party or by which it is bound; or (iii) any applicable law governing it;
- (c) that the individual(s) executing this Contract, and any document in connection herewith, on its behalf has(ve) been duly authorized to execute this Contract and any document in connection herewith, and has(ve) the full power and authority to bind it; and
- (d) that this Contract constitutes a legal and binding obligation on it, enforceable against it in accordance with its terms.

11.2 REPRESENTATIONS AND WARRANTIES OF THE ISSUER

The Issuer hereby represents and warrants as follows to the Holder, and acknowledges and confirms that the Holder is relying on such representations and warranties without independent inquiry in entering into this Contract:

- (a) that it has all the necessary corporate or other power to enter into and perform its obligations under this Contract;

- (b) that the execution, delivery and performance of this Contract by it has been duly authorized by all necessary corporate, governmental and/or other action and does not (or would not with the giving of notice, the lapse of time or the happening of any other event or condition) result in a violation or breach of or a default under or give rise to a right of termination, greater rights or increased costs, modification or cancellation or the acceleration of any obligation under (i) any of its constituent or by-law instruments; (ii) any contracts or instruments to which it is a party or by which it is bound; or (iii) any applicable law governing it;
- (c) that the individual(s) executing this Contract, and any document in connection herewith, on its behalf has(ve) been duly authorized to execute this Contract and any document in connection herewith, and has(ve) the full power and authority to bind it; and
- (d) that this Contract constitutes a legal and binding obligation on it, enforceable against it in accordance with its terms.

12 MISCELLANEOUS

12.1 AMENDMENTS

Except as herein provided, no amendment of this Contract other than Schedule A, Schedule E and Appendix C shall be effective unless made in writing and signed by the Parties.

12.2 GOVERNING LAW

This Contract shall be governed by and construed in accordance with the laws of the Republic of Singapore.

12.3 NOTICES

Any notice, demand, consent, request or other communication required or permitted to be given or made under this Contract shall:

- (a) be given or made in the manner set forth in section 11.1 of Chapter 1 of the Market Rules ;
- (b) be addressed to the other Party in accordance with the information set forth in Schedule D; and
- (c) be treated as having been duly given or made in accordance with the provisions of section 11.2 of Chapter 1 of the Market Rules.

12.4 NO THIRD PARTY RIGHTS

Except as otherwise specifically provided in this Contract, a person who is not a Party has no right under the Contracts (Rights of Third Parties) Act, Chapter 53B of Singapore to enforce or to enjoy the benefit of any term of this Agreement.

12.5 ENTIRE CONTRACT

This Contract sets out the entire agreement between the Parties with respect to its subject matter and supersedes and replaces any previous agreement, arrangement or understanding between the Parties, whether written or oral.

12.6 FURTHER ASSURANCES

Each Party shall promptly execute and deliver or cause to be executed and delivered all further documents in connection with this Contract that the other Party may reasonably require for the purposes of giving effect to this Contract.

12.7 WAIVER

A waiver of any default, breach or non-compliance under this Contract is not effective unless in writing and signed by the Party to be bound by the waiver. No waiver shall be inferred or implied by any failure to act or by the delay in acting by a Party in respect of any default, breach or non-compliance under this Contract by the other Party or by anything done or omitted to be done by the other Party. The waiver by a Party of any default, breach or non-compliance under this Contract shall not operate as a waiver of that Party's rights under this Contract in respect of any continuing or subsequent default, breach or non-compliance (whether of the same or any other nature).

12.8 SUCCESSORS AND ASSIGNS

This Contract shall enure to the benefit of, and be binding on, the Parties and their respective heirs, administrators, executors, successors substitutes (including persons taking by novation) and permitted assigns.

12.9 SEVERABILITY

Any provision of this Contract that is determined, by a court of competent jurisdiction from which no appeal can or has been made, to be invalid or unenforceable in any jurisdiction shall, as to that jurisdiction, be ineffective to the extent of that invalidity or unenforceability and shall be deemed severed from the remainder of this Contract, all without affecting the validity or enforceability of the remaining provisions of this Contract or affecting the validity or enforceability of such provision in any other jurisdiction.

12.10 COUNTERPARTS

This Contract may be executed in any number of counterparts, each of which shall be deemed to be an original and all of which taken together shall be deemed to constitute one and the same instrument. Counterparts may be executed either in original or faxed form and the Parties adopt any signatures received by a receiving facsimile machine as

original signatures of the Parties, provided that any Party providing its signature in such manner shall promptly forward to the other Party an original signed copy of this Contract which was so faxed.

In witness whereof the Parties have, by their respective duly appointed and authorized representatives, executed this Contract on the date(s) set forth below.

Signed by)
)	Signature
for and on behalf of)	
)	
in the presence of :)	
)	
(Name of Witness))
)	Signature
)	
Signed by)
)	Signature
for and on behalf of)	
)	
in the presence of :)	
)	
(Name of Witness))
)	Signature
)	
)	

SCHEDULE A

HEDGE QUANTITIES AND HEDGE PRICES

Data Item	Field Description
Reference	An arbitrary value used to uniquely identify a Vesting Contract
Name	A name of generating company
Settlement Account ID	The unique Settlement Account identifier that matches that within the NEM System
Settlement Date	Date (dd-mmm-yy)
Period	The period number the quantity relates to (1-48)
Contract Price	The Hedge Price in S\$/MWh
Contract Quantity	The Hedge Quantity This should be a positive number in KWh in each half-hour period

As an example, the Vesting Contract records will be in the following format:

Reference	Name	Settlement Account ID	Settlement Date	Settlement Period	Contract Price	Contract Quantity
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	1	123.00	245151
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	2	123.00	245174
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	3	123.00	245197
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	4	123.00	245220
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	5	123.00	245243
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	6	123.00	245266
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	7	123.00	245289
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	8	123.00	245312
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	9	123.00	245335
01030701-003	XXX Power	XXX PWR_G	01-Jul-03	10	123.00	245358
.
.
.
01030701-003	XXX Power	XXX PWR_G	30-Sep-03	48	123.00	246132

The actual values of Hedge Price and Hedge Quantity allocated to the Holder will be updated for the relevant quarter following the Vesting regime commencement date.

SCHEDULE B

PROCEDURE, ALGORITHM AND PARAMETERS FOR HEDGE QUANTITIES

1. DEFINITIONS - STANDING DATA

The data in this section are to be calculated using the information and or methodologies provided by the Authority and used as standing data.

1.1 DAY PROFILES

Day_Type is one of the three representative days (weekday, Saturday, Sunday/holiday).

Period is one of the 48 half-hour dispatch periods in a day.

The set PERIOD_TYPE[Day_Type, Period] classifies each period of each day type into one of the three period types (peak, off-peak and shoulder) .

1.2 LOAD GROWTH FACTORS

Load_Growth are the load growth factors to grow the data in LOAD_SET to the next Quarter. These data will be calculated Quarterly.

1.3 VESTING CONTRACT DATA

The proportion of load contracted for each day type and period type is specified as CONTRACT_LEVEL[Day_Type, Period_Type]. These data will be updated once every 2 years, or more often if the Authority deems fit.

The minimum total average level of contract cover, expressed as a percentage of aggregate annual electricity consumption in Singapore is to be, for each calendar year:

Year	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Coverage	65%	50%	50%	50%	50%	40%	40%	40%	40%	40%

1.4 GENERATOR DATA

The Generation Installed Capacity for each generating station is specified as INSTALLED_CAPACITY[Company, Station]. Where Company is a licensed generating company holding vesting contracts, and Station is the designation of a generation unit. Installed capacity is the capacity available for supply of energy to the market as specified in the standing data to the PSO. These data will be updated each Quarter as changes occur.

2. DEFINITIONS - QUARTERLY DATA

2.1 ASSIGNMENT OF REPRESENTATIVE DAYS TO DATES

DAY_TYPE[Date] is the day type for each date in the Quarter.

NUM_PERIODS[Day_Type, Period_Type] is the number of times that representative day type and period type occurs during the three-month period.

2.2 LOAD DATA

The set LOAD_SET is basic historic load data for 3 months for use in the next Quarter (being last two months of the previous Quarter and the first month of the current Quarter). These data will come from MSSL. For facilities that include an embedded generator above 1MW, this load set shall be the net load a facility consumes (that is total site load less that load supplied by the facilities embedded generation)

REP_TOTAL_LOAD[Day_Type, Period_Type] is the estimated total load of all consumers for each period type and day type over the Quarter derived from LOAD_SET and adjusted for Load_Growth.

3. CALCULATING HEDGE QUANTITIES

Each required Hedge Quantity for each contracted generating company are calculated using the following steps.

Step 1

Derive from LOAD-SET the historic load data of all consumers for each period type and day type over a Quarter. After scaling these Quarterly data for Load-Growth, the load of all consumers for each period and day type over the Quarter is:

REP_TOTAL_LOAD[Day_Type, Period_Type]

Step 2

For each day type and period type combination the load required to be contracted over the Quarter is:

MWh_CONTRACT[Day_Type, Period_Type] =

CONTRACT_LEVEL[Day_Type, Period_Type] × REP_TOTAL_LOAD[Day_Type, Period_Type]

Step 3

Determine the capacity of each generating company.

COMPANY_CAPACITY[Company] =

Sum Stations belonging to Company (INSTALLED_CAPACITY[Company, Station])

Step 4

The initial allocation of Hedge Quantity to each generating company over the Quarter is then:

$$\text{CONTRACT_ALLOCATION}[\text{Company}, \text{Day_Type}, \text{Period_Type}] = \frac{\{\text{COMPANY_CAPACITY}[\text{Company}] / \text{Sum}_{\text{companies with vesting contracts}} (\text{COMPANY_CAPACITY}[\text{Company}])\} \times \text{MWh_CONTRACT}[\text{Day_Type}, \text{Period_Type}]$$

Using arrays DAY_TYPE[Date], PERIOD_TYPE[Day_Type] and NUM_PERIODS[Day_Type, Period_Type], coverage is calculated for each half hour of each day.

Step 5

The total allocation to each generator for each period of each day is:

$$\text{CONTRACT}[\text{Company}, \text{Date}, \text{Period}] = \text{CONTRACT_ALLOCATION}[\text{Company}, \text{DAY_TYPE}[\text{Date}], \text{PERIOD_TYPE}[\text{DAY_TYPE}[\text{Date}], \text{Period}]]$$

The units of CONTRACT[Company,Date,Period] are MWh.

SCHEDULE C

PROCEDURE, ALGORITHM AND PARAMETERS FOR CALCULATING HEDGE PRICES

This Schedule C sets out procedures for the calculation of the Hedge Price by the Issuer associated with each Hedge Quantity in respect of any of the periods referred to in Clause 3.3.2 of the Contract. The calculation of the Hedge Price in respect of each such period shall be made by the Issuer in accordance with the mathematical formula set out in the paragraphs below on the basis of certain information and value to be provided by the Authority to the Issuer for the purposes of the computation of the Hedge Price for that period

1. The Issuer shall, each Quarter, using information and/or methodologies supplied by the Authority including:
 - 1.1 the Long Run Marginal Cost (LRMC) of the most efficiently configured Generating Unit of the most economic generating technology in operation in Singapore where the Authority shall determine this value in accordance with paragraph 3;
 - 1.2 the value of BASECOST, representing the cost of operating the Generating Unit referred to in 1.1, and the components of BASECOST being TOTAL FUEL COSTS, TOTAL CAPITAL COSTS, and TOTAL OVERHEAD COSTS where the Authority shall determine these values in accordance with paragraph 4;
 - 1.3 the Base Quarter, being the Quarter in which the values of LRMC and BASECOST are deemed to be current and relative to which all indices shall be applied;
 - 1.4 the FUEL COST INDEX for the Quarter which shall be an index determined by Authority in accordance with paragraph 6 reflecting the cost of fuel relative to the Base Quarter;
 - 1.5 the CAPITAL COST INDEX for the Quarter which shall be an index determined by the Authority in accordance with paragraph 7 reflecting the level of return on capital relative to the return on capital in the Base Quarter. This index shall equal 1 in the Base Quarter; and
 - 1.6 the OVERHEAD COST INDEX for the Quarter which shall be an index determined by the Authority in accordance with paragraph 8 reflecting the current average cost of consumption relative to the Base Quarter. This index shall equal 1 in the Base Quarter,

calculate the Hedge Price, HP_H , to apply in Half Hour H to all persons who by the terms of their generation licences are or are to be Parties to a Vesting Contract.

2. The Issuer shall set the Hedge Price, HP_H , to equal;

$$HP_H = LRMC \times [CURRENTCOST / BASECOST],$$

Where;

- 2.1 CURRENTCOST represents the total Quarterly cost of operating the Generating Unit referred to in 1.1 for the Quarter for which the HP_H values are being determined, and
- 2.2 BASECOST represents the total Quarterly cost of operating the Generating Unit referred to in 1.1 for a specified Base Quarter.
- 2.3 The value of LRMC provided to the Issuer by the Authority shall be determined using the calculation provided at paragraph 3.4.

3. Calculation of LRMC

3.1 The parameters used or to be used by the Authority in the determination of the value of LRMC shall be specified in the following table.

Reference	Parameter	Description	Method of and Party(ies) making determination
	Determination date	Date on which the calculations of the LRMC, which is to apply at the Application Date are deemed to be made. The Determination date will fall within the second month of the preceding calendar quarter. For example, the Determination date for LRMC to apply in 3 rd quarter of a calendar year will fall within May of that calendar year.	Determined by EMA.
	Base date	Date at which the LRMC base parameters are determined. The Base date will fall within the second month of the preceding calendar quarter. For example, the Base date for the LRMC parameters to apply in 3 rd quarter of a calendar year will fall within May of that calendar year.	Determined by EMA.
	Application date	Date from which the LRMC is to apply. The application date will be the start of each calendar	Determined by EMA.

Vesting Contract

Reference	Parameter	Description	Method of and Party(ies) making determination
		quarter. If the Base date is 3 or more months before the application date, the index adjustment should be used to update the Hedge Price for the application date.	
E25	Current Year	Year in which the Base Date falls.	Determined by EMA.
E26	Exchange Rate (\$US per \$Sing)	The exchange rate for a given Base date is the average monthly forward exchange rates at the Base date.	Determined by EMA (in consultation with finance experts)
E29	Economic capacity of the most economic new generation unit suitable for use in Singapore (MW)	The size of the most thermally efficient unit taking into account the requirements of the Singapore system, including especially the need to provide for contingency reserve to cover the outage of the unit and the fuel quantities available. It is acknowledged that this value may depend on the manufacturer. (For CCGT technology the size of the unit is expected to be around 370MW.)	Determined by EMA (in consultation with the engineering and power systems experts)
E27	Capital cost of the most economic new generation unit suitable for use in Singapore (\$US/kW)	Capital cost means the purchase and delivery cost of the plant in a state suitable for installation in Singapore and all associated equipment but <u>excluding</u> switch gear, fuel tanks, transmission and fuel connections, land, buildings and site development included in E30. Where more than one unit it is expected to be installed that will share	Determined by EMA (in consultation with the engineering and power systems experts)

Vesting Contract

Reference	Parameter	Description	Method of and Party(ies) making determination
		any equipment the costs of the shared equipment should be prorated to the unit	
E30	Land, infrastructure and development cost of the generation unit referred to in 1.1 (\$Sing million)	<p>Where more than one unit it is expected to be installed that will share any equipment or facilities the costs of the shared equipment or facilities should be prorated evenly to each of the units. These costs should include all capital, development and installation costs (<u>excluding</u> all costs included in the capital cost of plant included in E27 and financing costs during the build period). These costs should include the following items:</p> <ul style="list-style-type: none"> • Acquisition costs of sufficient land to accommodate the plant defined above (alternatively land may be included as annual rental cost under Fixed Annual Running Costs) Site development • Buildings and facilities • Connections to gas pipelines • Switchgear and connections to transmission system • Emergency fuel facilities • Project management and consultancy 	<p>Determined by EMA,</p> <p>(a) In consultation with the engineering and power systems experts in relation to the following values:</p> <ul style="list-style-type: none"> • Size of site required • Site development • Buildings and facilities • Connections to pipelines • Switchgear connections to transmission system • Emergency fuel facilities • Project management and consultancy <p>(b) In consultation with the real estate</p>

Vesting Contract

Reference	Parameter	Description	Method of and Party(ies) making determination
			experts in relation to land value.
E32	HSFO 180 CST Oil Price (\$US/MT)	The HSFO 180 CST Oil Price for a given Base date is the average monthly forward oil price at the Base date.	Determined by EMA.
E33	Gas Price based on HSFO 180 CST Oil Price (\$Sing/GJ)	Singapore gas price for gas delivered to electricity generating companies using existing Singapore gas contracts based on the HSFO price.	Determined by EMA.
E34	HHV Heat Rate of the generation unit referred to 1.1 (Btu/kWh)	The high heat value heat rate of the plant specified under E29 that is expected to actually be achieved taking into account any improvement or degradation in efficiency from installation in Singapore and other reasonable factors.	Determined by EMA (in consultation with the engineering and power systems experts)
E36	Build duration of the generation unit referred to in 1.1 (years)	The build duration is the time from beginning to incur the major cost of development and installation up to the plant commissioning. This parameter is used to calculate the financing cost over the duration of the building period and assumes the development costs are incurred evenly across this period. The build duration should be specified to reflect this use and meaning rather than the actual time from beginning site development to plant commissioning.	Determined by EMA (in consultation with the engineering and power systems experts)

Vesting Contract

Reference	Parameter	Description	Method of and Party(ies) making determination
E37	Economic lifetime of the generation unit referred to in 1.1 (years)	The expected time from commissioning to de-commissioning of the plant. This number is used to amortise the capital cost of the plant, installation and development.	Determined by EMA (in consultation with the engineering and power systems experts)
E38	Average expected utilisation factor of the generation unit referred to in 1.1, i.e. average generation level as a percentage of capacity (%)	The utilisation factor is the expected annual proportion of plant capacity that will be used for supplying energy for sale. It should exclude station usage, expected maintenance and forced outages and the expected time spent providing reserve capacity. The Determination of the factor should assume the plant is efficiently base-loaded.	Determined by EMA (in consultation with the engineering and power systems experts)
E41	Fixed annual running cost of the generation unit referred to in 1.1 (\$Sing)	<p>These costs are the fixed operating and overhead costs that are incurred in having the plant available for supplying energy and reserves but which are not dependent on the quantity of energy supplied. It is acknowledged that some costs are not easily classified as fixed or variable. The costs expected to be included in this parameter are:</p> <ul style="list-style-type: none"> • Operating labour – it is expected that the plant will be running for three shifts per day and seven days per week so all operating labour is likely to be a fixed annual cost • Direct overhaul and maintenance cost, with any semi-variable costs treated as annual fixed 	<p>(a) Determined by EMA, in consultation with the engineering and power systems experts in relation to the following values:</p> <ul style="list-style-type: none"> • Operating labour • Direct overhaul and maintenance cost • Costs of emergency fuel • Other overhead costs

Reference	Parameter	Description	Method of and Party(ies) making determination
		<p>costs</p> <ul style="list-style-type: none"> • Generating license • Insurance • Property tax • Costs of emergency fuel • Other charges • Other overhead costs 	<p>(b) Determined by EMA</p> <ul style="list-style-type: none"> • Generating license • Insurance • Property tax • Other charges
E42	Variable non-fuel cost of the generation unit referred to in 1.1 (\$Sing/MWh)	Any costs, other than fuel costs, that vary with the level of energy output for a base-load plant and are not covered by E41.	Determined by EMA (in consultation with the engineering and power systems experts)
E44	Proportion of debt to assets	The proportion of debt to total assets at market value. It is an estimate of the industry standard ratio for private sector generators in an economic environment similar to Singapore. The ratio is used to calculate the weighted average cost of capital (WACC).	Determined by EMA (in consultation with the finance experts)
E45	Risk free interest Rate in Singapore (%)	The risk free rate in Singapore for a given Base Date is determined as the average monthly yield on a default-free bond issued by the local gov-	Determined by EMA (in consultation with the finance experts)

Vesting Contract

Reference	Parameter	Description	Method of and Party(ies) making determination
		ernment at the Base date.	
E46	Cost of debt in relationship to the risk free rate (%)	Risk free rate plus a premium as determined by the Authority. The total cost of debt will comprise the base lending rate, the load margin and upfront and other fees.	Determined by EMA (in consultation with the finance experts)
E47	Market Risk Premium (%)	The market risk premium represents the additional return over investing in risk free securities an investor will demand for investing in electricity generators in Singapore	Determined by EMA (in consultation with the finance experts)
E48	Beta	Parameter for scaling the market risk premium for calculating the cost of equity. Beta is a measure of the expected volatility of the returns on a project relative to the returns on the market, that is, the systematic risk of the project.	Determined by EMA (in consultation with the finance experts)
E49	Additional Risks (%)	Additional risk premium over the cost of capital to reflect risk associated with full exposure to a merchant power market and full construction risk	Determined by EMA (in consultation with the finance experts)
E50	Tax rate (%)	Corporate tax rate applicable to generating companies in Singapore at the application date if known to be different from the rate at the Determination date. This rate should include any applicable tax rebates or tax incentives available to generating companies, and be consistent with the	Determined by EMA.

Vesting Contract

Reference	Parameter	Description	Method of and Party(ies) making determination
		gearing and interest rates defined in E44 & E45.	
E51	Cost of equity (%)	The cost of equity for the business as calculated from previous data. It is calculated as $E45 + (E47)(E48) + E49$.	Calculated by EMA (in consultation with the finance experts)

3.2 The value of WACC shall be calculated in accordance with the following formulae:

Where,

$$I22 = WACC = [(E44)(E45 + 0.02)(1 - E50)] + \{(1 - E44)[E45 + (E48)(E47) + E49]\}$$

calculated using the CAPM method

3.3 The Authority may revise the value of LRMC to address changes in the cost of the most efficient Generating Unit in operation in Singapore. A new Base Quarter shall be declared whenever such a revision occurs.

3.4 The value of LRMC shall be calculated in accordance with the following formulae:

$$LRMC = H22 = \text{Calculations!F52} = \text{Calculations!F39} + \text{Calculations!F50}$$

Where,

$$\begin{aligned} \text{Calculations!F39} &= \text{Annual Capital Cost} = \frac{(\text{Calculations!F38})(1,000,000)}{(8760)(E38)(E29)} \\ &= \text{Pre-tax Amortised Total Capital Cost} / \text{Annual Output} \end{aligned}$$

where Annual Output = (No of days in the year x 24) x E38 x E29

$$\begin{aligned} \text{Calculations!F50} &= \text{Avoidable Cost} = \left[\frac{(E33)(E34)(1.056)}{1000} \right] + E42 + \frac{E41}{(8760)(E38)(E29)} \\ &= \text{SRMC} + \text{Total Fixed Running Cost} / \text{Annual Output} \end{aligned}$$

Calculations!F38 = Pre-tax Amortised Total Capital Cost

$$= \frac{\text{Calculations!F37} - (\text{Calculations!F14}/E37)}{(1 - E50)} + \frac{\text{Calculations!F14}}{E37}$$

= Amortised Total Capital Cost adjusted for tax benefits of depreciation

Where,

$$\text{Calculations!F14} = \text{Total Capital Cost} = \left[(E29) \left[\frac{(E27/E26)}{1000} \right] + E30 \right]$$

$$+ \left\{ \left[\left(E29 \right) \left[\frac{(E27/E26)}{1000} \right] + E30 \right] (1 + I22)^{E36} \right\} / 2$$

$$- \left[\left(E29 \right) \left[\frac{(E27/E26)}{1000} \right] + E30 \right]$$

= Plant Purchase Cost + Infrastructure Cost + Project Financing Cost

Calculations!F37 = Amortised Total Capital Cost

$$= \frac{(Calculations!F14)(1 + I22)^{E37}}{\left[\frac{(1 + I22)^{E37} - 1}{I22} \right]}$$

= Total Capital Cost amortised at WACC

4. The Authority shall set the components of BASECOST to reflect the costs associated with the most efficient Generating Unit in the Base Quarter where BASECOST shall be defined as:

$$\text{BASECOST} = \text{TOTAL FUEL COSTS} + \text{TOTAL CAPITAL COSTS} \\ + \text{TOTAL OVERHEAD COSTS}$$

Where:

- 4.1 TOTAL FUEL COSTS represents the total fuel related cost, in units of \$/MWh, incurred in electricity generation by the Generating Unit referred to in 1.1 during the Base Quarter.
- 4.2 TOTAL CAPITAL COSTS represents the total capital related cost, in units of \$/MWh, incurred by the Generating Unit referred to in 1.1 during the Base Quarter.
- 4.3 TOTAL OVERHEAD COSTS represents the total overhead costs, in units of \$/MWh, being costs not related to fuel or capital, associated with the Generating Unit referred to in 1.1 during the Base Quarter.
5. The value of CURRENTCOST shall be determined by the Issuer each Quarter and shall be defined as:

$$\begin{aligned} \text{CURRENTCOST} &= \text{TOTAL FUEL COSTS} \times \text{FUEL COST INDEX} \\ &+ \text{TOTAL CAPITAL COSTS} \times \text{CAPITAL COST INDEX} \\ &+ \text{TOTAL OVERHEAD COSTS} \times \text{OVERHEAD COST INDEX} \end{aligned}$$

Where *TOTAL FUEL COSTS*, *TOTAL CAPITAL COSTS*, and *TOTAL OVERHEAD COSTS* shall have the values specified by the Authority for the Base Quarter.

6. The FUEL COST INDEX shall be an index specified by the Authority reflecting the cost of fuel for the Generating Unit referred to in 1.1 for the current Quarter relative to the Base Quarter.

6.1 In the first Quarter (Q=1) of the contract and in any Base Quarter the FUEL COST INDEX shall equal one.

6.2 In any subsequent Quarter (Quarter Q>1) of the contract, unless this Quarter is a Base Quarter, the FUEL COST INDEX shall be:

$$A \times E \times (HOP_D / HOP_B + F)$$

Where:

(a) HOP_B is the average monthly forward fuel oil prices at the Base date and HOP_D is the average monthly forward fuel oil prices at the Determination date.

(b) Function F is an adjustment factor to correct for the non-linear effects of gas formula and shall be defined as:

$$F = (HOP_B - HOP_D) (f1 / HOP_B^2 + f2 / HOP_B^3)$$

Parameters f1 and f2 are determined using multiple regression.

(c) Parameter A is an adjustment index to correct for annual changes in the gas price formula and shall be defined as:

$$A = (\text{total fuel cost in year } y+1) / (\text{total fuel cost in year } y)$$

(d) Function E corrects for the changes in the US\$ exchange rate and shall be defined as:

$$E = (1 + e1 * (ER_D - ER_B) + e2 * (ER_D - ER_B)^2)$$

where ER_D is the average monthly forward exchange rates (\$US/\$Sing) at the Determination date and ER_B is the average monthly forward exchange rates (\$US/\$Sing) at the Base date.

Parameters e1 and e2 are determined using multiple regression.

7. The CAPITAL COST INDEX shall be an index specified by the Authority reflecting the capital cost for the current Quarter relative to the Base Quarter. This index has two components.

- Changes in the cost of acquiring and building new plant and
- Exchange rate movements on cost of new plant

7.1 Capital Cost index = CI

7.2 Where CI is the index of cost changes

7.3 For CI the primary changes in the underlying factors can be broadly captured by inflation and foreign exchange, with a full-scale revaluation of all these costs to be undertaken every two years. Since the DSPI (Domestic Supply Price Index) includes both the domestic inflation and foreign exchange elements for products, this is a suitable simple index to use.

7.4 CI is calculated as follows:

- Take the DSPI from Singapore Department of Statistics for the Base date: $DSPI_B$
- *Find the most recent DSPI from Singapore Department of Statistics for the Determination date: $DSPI_D$ and the DSPI for the quarter (D-2), two quarters before the quarter D in which the Determination Date falls: $DSPI_{D-2}$, where the DSPI for a quarter is calculated as the simple average the DSPI for each month in that quarter.*
- Calculate the simple two-Quarter extrapolation

$$DSPI_{D+1} = DSPI_D + (DSPI_D - DSPI_{D-2}) / 2$$

- For the next Quarter $CI = DSPI_{D+1} / DSPI_B$

8. The OVERHEAD COST INDEX is largely an inflation index to be specified by the Authority reflecting the overhead cost for the current Quarter relative to the Base Quarter. The primary elements of the non-fuel overhead costs are wages and imported spare parts. In the absence of a wage rate index, the Consumer Price Index (CPI) can be used although the DSPI may more realistically reflect the cost of imported parts. On balance, since spare parts tend to be ordered sporadically, the CPI is the most appropriate.

8.1 The Overhead cost index is calculated as follows:

- Take the CPI from Singapore Department of Statistics for the Base date: CPI_B
- *Find the most recent CPI from Singapore Department of Statistics for the Determination date: CPI_D and the CPI for the quarter (D-2), two quarters before the quarter D in which the Determination Date falls: CPI_{D-2} , where the CPI for a quarter is calculated as the simple average of the CPI for each month in that quarter.*

- Calculate the simple two-Quarter extrapolation

$$CPI_{D+1} = CPI_D + (CPI_D - CPI_{D-2})/2$$

- The Overhead cost index for the next Quarter equals CPI_{D+1} / CPI_B .

The Authority will use the CPI for the Overhead cost index.

SCHEDULE D

ADDRESS AND REPRESENTATIVE FOR NOTICE

For the Holder:

Name of Representative	
Title	
Address	
Email Address	
Telephone Number(s)	
Facsimile Number(s)	

For the Issuer:

Name of Representative	
Title	
Address	
Email Address	
Telephone Number(s)	
Facsimile Number(s)	

SCHEDULE E

PRIMARY FUEL OF GENERATING UNITS

Unit Identifier	
Location	
Capacity	
Primary Fuel	

Unit Identifier	
Location	
Capacity	
Primary Fuel	

APPENDIX A

Notice of Disagreement on Vesting Data

Submitted by	:	<input type="text"/>	
Holder (Generating Company)	:	<input type="text"/>	
<hr/>			
Vesting Contract Reference	:	<input type="text"/>	
Date	:	<input type="text"/>	Period : <input type="text"/>
<hr/>			

Description of disagreement

Proposed Adjustment to the data used to calculate any relevant HP or HQ amount

Proposed Correction to any calculation of the relevant HP or HQ amount

Holder must provide supporting materials to support the abovesaid Notice.

APPENDIX B

Notice of Force Majeure Adjustment Event (FMAE)

Name and address of the Holder/Issuer	
Notice date and time	
Current installed capacity (MW) of the Holder (where applicable)	
Full particulars of the FMAE	
Effect of the FMAE	
The date and time of the FMAE occurrence	
The estimated cessation date and time of FMAE	
The revised installed capacity of the Holder due to the FMAE (where applicable)	

Submitted By :

Name of representative from Holder/ Issuer

Signature of representative from Holder/ Issuer

Date of Signature