

**Subject To Contract: Draft dated: [ ] ] Note: Delete on version prepared for signature**

## Agreement Ref: Tungsten Network – [ ] - MSA

**THIS MASTER SERVICES AGREEMENT (“MSA”)** is effective as of the [ ] day of [ ] 20[ ] (the “**Effective Date**”) **BETWEEN:**

- a. **TUNGSTEN NETWORK LIMITED**, a company incorporated in England and Wales under registered number 03958038 whose principal place of business is at Pountney Hill House, 6 Laurence Pountney Hill, London, EC4R 0BL, UK (“**Tungsten Network**”); and
- b. [ ] a company incorporated in [ ] under number [ ] whose principal place of business is at [address] (“**Client**”).

### 1. DEFINITIONS

Defined terms used in this MSA have the meaning given in Schedule 1.

### 2. CONTRACTING ARRANGEMENTS FOR THE PURCHASE OF TUNGSTEN NETWORK SERVICES

- 2.1. During the Term Client may purchase specified Tungsten Network services under mutually agreed statements of work, executed by both parties, each of which shall incorporate the terms, and be a part, of this MSA unless (and to the extent) stated otherwise in the statement of work (each a “**SOW**”).
- 2.2. Each SOW shall contain details of the particular requirements (including service levels, fees, term and scope of use) for the Tungsten Network services purchased.
- 2.3. A SOW shall only become effective once signed by an authorised representative of both Tungsten Network and Client.
- 2.4. Tungsten Network shall perform the services specified under a SOW in accordance with the terms of this MSA and the relevant SOW. Performance of any of the services by an Affiliate of Tungsten Network will be governed by the terms of this MSA and the relevant SOW and Tungsten Network shall be responsible for the acts or omissions of any such Tungsten Network Affiliate. In the event of conflict or inconsistency between any SOW and this MSA, the SOW shall take precedence.

### 3. CONSENTS IN RELATION TO USE OF SERVICES BY AUTHORISED AFFILIATES

- 3.1. The Tungsten Network services purchased under a SOW may also be used by the Authorised Affiliates stated in the relevant SOW. To facilitate such extended usage Client confirms it has the necessary authority and consent from such Authorised Affiliates allowing Client:
  - 3.1.1. (And Tungsten) to access and use the TN Network in relation to the storage and processing of Content.
  - 3.1.2. To give Tungsten Network instructions relating to the Authorised Affiliates, their Content and any Tungsten

Network services provided for the Authorised Affiliates under the relevant SOW.

- 3.1.3. To give Tungsten Network the confirmations, acknowledgements and authorisations referred to in this MSA and the relevant SOW on behalf of the Authorised Affiliates.
- 3.2. As a material condition of receiving the Tungsten Network services specified in a SOW, Client:
  - 3.2.1. Shall procure that each Authorised Affiliate is aware that the Tungsten Network services are provided on and subject to terms of this MSA and the relevant SOW and acknowledges that their use of the Tungsten Network services constitutes acceptance of the same.
  - 3.2.2. Confirms that it is responsible for the acts and omissions of the Authorised Affiliates in their use of the Tungsten Network services.
  - 3.2.3. Confirms that Tungsten Network may act and rely on instructions issued to it from time to time by the Client and/or any Authorised Affiliate.

### 4. TERM

- 4.1. This MSA shall begin on the Effective Date and shall continue until all of the SOWS entered into under it have been rightfully terminated or have expired (the “**Term**”).

### 5. GENERAL PAYMENT TERMS

- 5.1. Fees are payable as specified in this clause and as further described in the relevant SOW (or as otherwise agreed by the parties in writing).
- 5.2. Client shall pay all fees on the dates specified in any SOW or, if no date is specified, within thirty (30) days of invoice.
- 5.3. Tungsten Network may send invoices to Client electronically via the TN Network, unless otherwise agreed in writing. Payments due on the start date of a SOW will not be invoiced electronically.
- 5.4. All amounts specified in any SOW are exclusive of Taxes, which shall be paid by Client.
- 5.5. If Client is required by law to make any deductions or withholdings from payments to Tungsten Network, Client shall submit additional payment as necessary to ensure that the net payment to Tungsten Network equals the amount due notwithstanding any deductions or withholdings.

### 6. ACCESS TO TUNGSTEN NETWORK AND SERVICES

- 6.1. To support secure service provision by Tungsten Network, Client shall ensure that access to the TN Network is only made by Client Users using valid Tungsten Network generated service access credentials and shall notify Tungsten Network

without delay if it or any Authorised Affiliate becomes aware of any unauthorised access, or attempted access, to the TN Network.

- 6.2. Client is responsible for the acts and omissions of the Client Users and for the security of such access credentials and any unauthorised use of them.
- 6.3. Tungsten Network may deny access to any person if it suspects that they are not duly authorised to access the TN Network.
- 6.4. Tungsten Network will implement all reasonable protections to prevent the delivery of data files or data images from the TN Network containing Harmful Code. Notwithstanding the foregoing, Client and any relevant Authorised Affiliates remain responsible for ensuring that they have Harmful Code detection technology and firewall technology implemented and operating in accordance with current good industry practice to protect the integrity of their systems, environment and data and Tungsten Network shall not be responsible for any damage or loss caused by any failure on their part to do so.
- 6.5. Client will (and will procure that any relevant Authorised Affiliates) implement all reasonable protections to prevent the delivery of data files or data images to Tungsten Network or the TN Network containing Harmful Code. Notwithstanding the foregoing, Tungsten Network remains responsible for ensuring that it has satisfactory Harmful Code detection technology and firewall technology implemented and operating to protect the integrity of its systems, environment and data and Client shall not be responsible for any damage or loss caused by any failure on Tungsten Network's part to do so.

## **7. USAGE OBLIGATIONS**

- 7.1. Client shall not (and shall procure that none of the relevant Authorised Affiliates):
  - 7.1.1. Contravene any legal and/or regulatory requirements to which they are subject when using the TN Network.
  - 7.1.2. Use the TN Network to process or store any data that: (i) is unlawful, defamatory, obscene, libellous, invasive of another's privacy, menacing or racially or otherwise objectionable; (ii) is submitted for test purposes that contains real (i.e. non test data) or Personal Data (sensitive or otherwise); and/or (iii) infringes any third party intellectual property rights.
  - 7.1.3. Use the TN Network to process or to store and/or collect Personal Data relating to any user of the TN Network or any third party without their consent.
- 7.2. Client shall indemnify and hold Tungsten Network harmless from and against any claim, liability, fine, penalty, damage, loss or other expense (including, without limitation, interest or reasonable legal fees and costs) which Tungsten Network may incur as a

result of Tungsten Network processing or storing material received in breach of clause 7.1.

- 7.3. It is the responsibility of the Client (and of each relevant Authorised Affiliate) to:
  - 7.3.1. Maintain current VAT registrations and other statutory filings with all applicable governmental authorities.
  - 7.3.2. Remit, report, account for and reclaim its Taxes in accordance with all relevant requirements.
  - 7.3.3. Retain and store all digitally signed human readable invoice documents submitted by Tungsten Network where required by applicable law.
- 7.4. To facilitate smooth operation of service provision, Client shall:
  - 7.4.1. Notify Tungsten Network of the current VAT (or local equivalent) registration numbers of Client and each relevant Authorised Affiliate and any changes to those registrations;
  - 7.4.2. Notify Tungsten Network in writing if any data or Content that Tungsten Network processes, stores and/or collects on behalf of Client or an Authorised Affiliate will or may contain Sensitive Personal Data. If any data/Content is submitted to the TN Network by or on behalf of Client/Authorised Affiliate that will/may contain Sensitive Personal Data Client is recommended to select a secure method of transmission/delivery option (and failure to do so is at its risk);
  - 7.4.3. (And shall procure that the Authorised Affiliates shall) promptly update its/their systems to reflect any changes to bank details requested by Supplier for the goods and services it provides.
- 7.5. Client shall ensure that neither it nor any of the Authorised Affiliates':
  - 7.5.1. Permit or otherwise allow third party access to the TN Network and/or enable third parties to give such access.
  - 7.5.2. Copy, download, disseminate, reproduce, publish, transmit, use or modify any part of the TN Network and/or the Documentation except as expressly permitted by this MSA or any SOW or as permitted by Tungsten Network in writing.
  - 7.5.3. Remove, alter or obscure any product or service identification, trade-marks, copyright or other notices contained in the Documentation.
  - 7.5.4. Attempt to interfere with the operation of Tungsten Network including, without limitation, by means of overloading, flooding and/or crashing.

## **8. WARRANTIES, LIMITATIONS OF LIABILITY AND INSURANCES**

- 8.1. Subject to the limitations in this MSA and in any relevant SOW, Tungsten Network warrants to the Client that:

- 8.1.1. It has the capacity and authority to enter into and perform this MSA and each SOW entered into under it.
- 8.1.2. To the best of its knowledge, the use of the TN Network by the Client in accordance with this MSA and any SOW (excluding any Content) does not infringe any third party intellectual property rights.
- 8.1.3. The TN Network, unmodified by the Client and when used in accordance with this MSA, any relevant SOW and the Documentation, will function substantially in accordance with the specifications in the relevant SOW.
- 8.1.4. It shall perform the Tungsten Network services specified in any SOW with reasonable skill and care.
- 8.1.5. All personnel provided by Tungsten Network to perform the Tungsten Network services specified in a SOW will be appropriately skilled and qualified.
- 8.1.6. It shall perform the Tungsten Network services specified in a SOW in accordance with the applicable laws of the e-Invoice Compliant Countries that are relevant to the Tungsten Network services specified in that SOW to the extent that Tungsten Network is required to comply with the same. Tungsten Network does not warrant compliance with any regulatory or legal responsibilities imposed from time to time on senders and receivers of invoices.
- 8.2. Without prejudice to the service levels stated in a SOW, Tungsten Network does not warrant that the operation of, or access to, the TN Network will be uninterrupted, error free or delivered at a particular speed.
- 8.3. The warranties given in clause 8.1 (or in any SOW) shall not apply to the extent that any non-compliance of Tungsten Network and/or the TN Network with such warranties is caused by or arises from:
  - 8.3.1. Unauthorised use of the TN Network.
  - 8.3.2. Use of the TN Network in conjunction with third party software and/or materials used by Client/Authorised Affiliate where use otherwise than in such conjunction would not have caused such non-compliance.
- 8.4. Except as expressly provided in this MSA, or in any SOW, the TN Network (including without limitation any encryption, detection or firewall technology) are provided "as is" without warranty or representation of any kind either express or implied including without limitation any warranties of merchantability, quality, fitness for a particular purpose, title and non-infringement.
- 8.5. Neither party excludes or limits any liability to the other party under this MSA or any SOW in respect of:
  - 8.5.1. Death or personal injury caused by its negligence or that of its employees or sub-contractors.
  - 8.5.2. Any fraudulent representations made by it on which the other party can be shown to have relied.  
Furthermore, nothing in this clause 8 shall limit or exclude the liability of Client to pay the fees due for services under each SOW or for any failure to comply with clause 8.9.
- 8.6. Subject to clause 8.5, neither party (nor its affiliates) shall be liable under this MSA or any SOW, whether in contract or in tort (including negligence or breach of statutory duty) or otherwise, for:
  - 8.6.1. Any loss of profit or goodwill.
  - 8.6.2. Lost discounts.
  - 8.6.3. Loss of business opportunity or business.
  - 8.6.4. Lost savings.
  - 8.6.5. Business interruption.
  - 8.6.6. Any special, indirect, punitive or consequential damages.  
Even (in each case) if any such loss or damage was reasonably foreseeable or the other party had been advised of the possibility of such loss or damage. The parties agree that each of sub-clauses 8.6.1 – 8.6.6 (inclusive) are separate terms and are intended to be severable.
- 8.7. Tungsten Network and its affiliates shall not be liable for any delay or failure in performance to the extent that such delay or failure is due to or arises from any Force Majeure Event, Content and/or any act or omission of Client, the Authorised Affiliates, Client Users or of other users of the TN Network (excluding Tungsten).
- 8.8. Subject to clauses 8.5 and 8.6, and save in respect of the indemnities contained in clause 11.1 and clause 13.8, the aggregate and entire liability of Tungsten Network and its affiliates for losses or damage howsoever arising out of or in connection with each SOW (including without limitation negligence or breach of statutory duty) from events, and/or a chain of events, commencing in:
  - 8.8.1. The first twelve (12) months of that SOW, will not exceed the amount of fees paid to Tungsten Network by the Client pursuant to that SOW until the date of occurrence of the first event giving rise to the liability (less any repayments, rebates, credits or other deductions).
  - 8.8.2. Any subsequent twelve (12) month period, will not exceed the amount of fees paid to Tungsten Network by the Client pursuant to that SOW during the previous twelve (12) month period (less any repayments, rebates, credits or other deductions).  
The first twelve (12) month period shall commence on the date that the relevant SOW is stated to commence on. Each following period shall commence on the relevant anniversary of that date.

8.9. To avoid doubt, the limitations on liability in this MSA and any SOW apply to the aggregated total of all losses sustained by Client and the Authorised Affiliates (collectively) under such SOW. At the request of Tungsten Network, the Client shall, and shall procure that its Authorised Affiliates shall, promptly execute all deeds and other documents in favour of Tungsten Network to enable Tungsten Network to enforce the limitations and exclusions of liability in this MSA against each Authorised Affiliate directly.

8.10. Tungsten Network shall maintain throughout the Term (and for a period of three (3) years thereafter) insurance coverage with providers with an "A-" or "X" or better rating by A.M Best in accordance with the following requirements (which shall be evidenced by a copy of a letter from Tungsten Network's brokers on request):

8.10.1. All insurances required by law (for example: Employers Liability Insurance or Workers Compensation Insurance).

8.10.2. Public and Product Liability/General Commercial Liability Insurance on an occurrence basis with a limit of not less than £5million per occurrence and in the aggregate.

8.10.3. Errors and Omissions (Professional Liability) insurance appropriate to the TN Network services with a limit of not less than £3 million per occurrence or in the aggregate.

## **9. CONFIDENTIALITY AND ACCESS TO INFORMATION**

9.1. Subject to clause 9.2, each party shall maintain the confidentiality of the other party's financial, pricing and customer/supplier information, and any other information of that party that is designated as "confidential", that it gains access to in the course of this MSA and any SOW by using the same degree of care with which it protects its own confidential information of a similar nature (and no less than reasonable care) and shall limit access to such confidential information to those of its employees, contractors and agents who need such access for the purposes consistent with this MSA and any SOW and who have signed confidentiality agreements containing protections no less stringent than those contained herein. To avoid doubt:

9.1.1. Invoice, purchase order and remittance data of the Client that is transmitted via the TN Network shall be treated as confidential information of the Client.

9.1.2. Tungsten Network is authorised to disclose data transmitted to the TN Network by Client/Authorised Affiliate for onward transmission in accordance with the instructions of the Client (or an Authorised Affiliate).

9.2. Information shall not be considered to be confidential if it:

9.2.1. Is already known by the recipient.

9.2.2. Becomes, through no act or default of the recipient, publicly known.

9.2.3. Is received by the recipient from a third party without restriction on disclosure or use.

9.2.4. Is independently developed by the recipient without reference to the other party's confidential information.

9.2.5. Is required to be disclosed by law or regulation.

9.3. On expiry or termination of this MSA, Tungsten Network shall promptly (on request) of Client or Authorized Affiliate purge, delete or destroy any confidential information of Client or Authorized Affiliate that is in Tungsten Network's possession or control, save that Tungsten Network may retain such confidential information if it is: (i) subject to ownership or user rights of a third party; (ii) under a legal obligation to retain such confidential information; or (iii) necessary for back-up purposes.

9.4. On the request of the Client, on reasonable prior notice during the Term, Tungsten Network shall provide the tax authorities and customs and excise authorities in the jurisdictions that are relevant to the Content access to the TN Network and the Content stored in the Data Warehouse, for the purposes of conducting tax and/or customs and excise audits.

9.5. Client acknowledges that, notwithstanding any other provision of this MSA or any SOW, where lawful regulatory agents (e.g. tax authorities) require access to Content Tungsten Network holds on behalf of the Client (or an Authorised Affiliate), Tungsten Network shall (i) grant such access; (ii) and (where lawfully entitled to do so) inform the Client in writing of such access being granted. Tungsten Network shall have no liability to Client or any Authorised Affiliate in relation to the grant of such access.

## **10. DATA PROTECTION**

10.1. Tungsten Network acknowledges that the Client is acting in its own capacity and/ or on behalf of Authorised Affiliates (as identified to Tungsten Network from time to time in any SOW), and that the Client and/ or the relevant Authorised Affiliate is the Data Controller in respect of any Personal Data that Tungsten Network processes on the Client's or Authorised Affiliate's behalf in the course of providing specified Tungsten Network services and that Tungsten Network is a Data Processor of such data.

10.2. During the Term, each party shall ensure that it (and Client shall procure that each of the Authorised Affiliates) complies with its respective obligations pursuant to applicable data protection and privacy laws, including (if applicable) the European data protection legislation as implemented by the EU Member States, at all relevant times.

- 10.3. Tungsten Network agrees that it shall:
- 10.3.1. Only carry out Processing of Personal Data in accordance with the Client's instructions.
- 10.3.2. Implement appropriate technical and organisational measures against the accidental, unauthorised or unlawful Processing, destruction, loss, damage or disclosure of Personal Data and adequate security programmes and procedures to ensure that unauthorised persons do not have access to the Personal Data or to any equipment used to Process the Personal Data which ensure a level of security that is reasonably appropriate to the risk represented by the Processing and the nature of the Personal Data to be Processed.
- 10.3.3. Notify the Client of any unauthorised or unlawful Processing, or any accidental loss, destruction, damage, alteration or disclosure, of Personal Data promptly after becoming aware of the same, keep the Client informed of any related developments and comply with the Client's reasonable instructions to mitigate any potential damage caused by such events.
- 10.4. Tungsten Network shall not keep Personal Data of the Client or an Authorised Affiliate for longer than necessary to:
- 10.4.1. Perform its obligations under this MSA or any SOW.
- 10.4.2. Perform any contractual or legal obligations to any other Data Controller of that Personal Data.
- 10.4.3. Comply with any applicable law or regulation.
- 10.5. To the extent that Personal Data is simultaneously subject to the compliance obligations of a Data Controller that is not the Client (such as a supplier of Client/Authorised Affiliate that is licensed to use the TN Network), the Client acknowledges that Tungsten Network is required to comply with its contractual obligations to any such additional Data Controller and consequently nothing in this MSA or any SOW shall prevent Tungsten Network from complying with its contractual obligations to such additional Data Controllers.

## **11. THIRD PARTY INTELLECTUAL PROPERTY CLAIMS**

- 11.1. Subject to clause 11.2 and clause 11.3, if the Client promptly notifies Tungsten Network in writing of a third party claim against Client or a relevant Authorised Affiliate that their use of the TN Network (excluding any Content) in accordance with the terms of this MSA and any SOW and the Documentation infringes any third party validly granted European Union enforceable patent or copyright ("**Claim**"), Tungsten Network will promptly and diligently defend such Claim at its expense and will pay any costs or damages that may be finally awarded to the third party by a court of competent jurisdiction and any reasonable damages, losses, costs and expenses (including legal fees) of the Client in connection with the Claim.

- 11.2. Tungsten Network will have no liability for any Claim if it arises from:

- 11.2.1. Unauthorised use of the TN Network.
- 11.2.2. Use of the TN Network in conjunction with third party materials used by Client/Authorised Affiliate where use otherwise than in such conjunction would not have caused the infringement.
- 11.3. All indemnities in this MSA or in any SOW shall be subject to the party seeking to rely on such indemnity: (i) promptly notifying the indemnifying party in writing of such claim; (ii) giving the indemnifying party reasonable information, assistance and cooperation required to defend such suit, claim or proceeding; (iii) the indemnified party (and the relevant Authorised Affiliate, where the indemnified party is the Client) mitigating its losses; (iv) the indemnifying party having sole control of the defence and all related settlement negotiations; and (v) the Client procuring that the Authorised Affiliates have provided Client with such notice, assistance and authority in relation to any Claim and that none of the Authorised Affiliates has made any such admissions or offers to settle the Claim.
- 11.4. If the Client's use of the TN Network is, or in Tungsten Network's sole opinion is likely to be, held to infringe the intellectual property of any third party, Tungsten Network shall at its expense and option either: (a) procure the right for Client to continue such use; (b) replace the relevant Tungsten Network services with a non-infringing equivalent; (c) modify the relevant Tungsten Network services to make it/them non-infringing; or (d) terminate this MSA or any affected SOW and refund a pro-rata proportion of any annual subscription fees paid by Client for such period of time in which Client was unable to use the Service under the affected SOW. The remedies described in clauses 11.1 and 11.4 constitute Client's sole and exclusive remedies and Tungsten Network's entire liability with respect to infringement of third party intellectual property.

## **12. TERMINATION**

- 12.1. Either party may terminate any SOW (or all of the SOWS) immediately on written notice to the other on the other party having a receiver, liquidator, administrator or administrative receiver appointed, ceasing to trade or having a winding-up order made against it, or passing resolutions for winding-up (other than for a solvent reconstruction or amalgamation) or making any composition or arrangement with creditors generally.
- 12.2. Either party may terminate a SOW if the other party materially breaches that SOW and (if capable of cure) fails to correct the breach within forty-five (45) days following written notice from such party specifying the breach.



- 12.3. Either party may terminate any SOW (or all of the SOWS) immediately on written notice to the other pursuant to clause 13.5 (Force Majeure).
  - 12.4. Tungsten Network may terminate any SOW (or all of the SOWS) immediately on written notice to Client pursuant to clause 11.4 (Third party Intellectual Property Claims).
  - 12.5. Unless expressly stated otherwise in a SOW, Tungsten Network shall cease to process Content received in relation to a SOW after termination of that SOW and shall deliver a closing invoice to Client under that SOW. All rights of Client to access the TN Network shall cease when all SOWS under this MSA have come to an end.
  - 12.6. Termination or expiration of this MSA or any SOW entered into under it will not relieve or release either party from making payments or performing obligations which may be owing to the other party under the terms of this MSA or the relevant SOW.
  - 12.7. Notwithstanding anything to the contrary, clauses 7.2 and 8 to 13 (inclusive) shall survive termination or expiration of this MSA and any SOW entered into under it.
- 13. MISCELLANEOUS**
- 13.1. Entire Agreement: This MSA and all SOW' s entered into under it set out the complete agreement between the parties and supersede all previous agreements (including any pre-printed terms on any Client purchase order). Each party acknowledges that no reliance is placed on any representations, warranties or statements made but not embodied in this MSA or any SOW. Nothing in this MSA or any SOW shall relieve either party of any liability for fraudulent misrepresentation. The terms of this MSA or any SOW may ONLY be modified in writing signed by authorised representatives from both parties.
  - 13.2. **Notices:** All notices which are required to be given under this MSA or any SOW shall be in writing and shall be sent to the address of the recipient set out in this MSA or any SOW or such other address as the recipient may designate by notice given in accordance with this clause. Notices of termination may be served personally or by first class, pre-paid post (and shall be deemed to have been duly given as stated below). Any other such notice may be delivered personally, by first class pre-paid letter, by facsimile transmission or by e-mail. Notices shall be deemed to have been received:
    - 13.2.1. If by hand delivery, at the time of delivery.
    - 13.2.2. If by first class post, five (5) days after the date of mailing.
    - 13.2.3. If by facsimile, immediately on transmission, (provided that the fax confirmation slip indicates that the transmission was communicated "OK").
    - 13.2.4. If by e-mail sent with receipt requested, on the date sent (provided that the sender does not receive a delivery failure message in respect of the e-mail).
  - 13.3. **Severability:** If any provision in this MSA or any SOW is invalid under any applicable statute or rule of law, it is to that extent to be deemed omitted. The remainder of the MSA and any SOW shall be valid and enforceable to the maximum extent possible.
  - 13.4. **Assignment:** Neither party may transfer or assign its rights or obligations under this MSA or any SOW without the prior written consent of the other save that Tungsten Network may assign its rights or obligations under this MSA or any SOW to any Affiliate and/or successor corporation or entity (whether by purchase of all or substantially all of the assets or outstanding issued share capital of Tungsten Network or by merger or consolidation), provided that: (i) Client is given prior written notice; and (ii) the transferee agrees to be bound by and subject to all of the terms and provisions of the MSA or the SOW being assigned. Subject to the foregoing sentence, this Agreement will be binding upon and inure to the benefit of the parties hereto, their successors and assigns.
  - 13.5. **Force Majeure:** Except for obligation for payment properly due, neither party shall be responsible for any delay or failure to perform when its failure results from any of the following cause: Acts of God or public enemies, civil war, insurrection or riot, fire, flood, acts or terrorism, explosion, earthquake or serious accident, change of law, failure of the Internet, pandemic, strike, labour trouble or work interruption or any cause beyond its reasonable control ("**Force Majeure Event**") and the time for performance of obligations by the party subject to such event will be extended for the duration of such event. The parties will consult with the object of reaching agreement as to how such cause or consequence may be overcome or alleviated. If any Force Majeure Event prevails for a period of forty-five (45) days or more, such that the affected party is prevented from substantially performing its obligations, then either party may terminate the relevant SOW by written notice to the other without liability for such termination. All payments and/or fees outstanding at the date of termination remain due and payable.
  - 13.6. **Waiver:** No delay or failure of either party to exercise any right provided for in this MSA or any SOW shall affect the ability of the party to subsequently exercise that right or be deemed a waiver of any other right under this MSA or any SOW. Any waiver must be in writing and expressly refer to this clause to be effective.
  - 13.7. **Responsibility for Employees:** Each party confirms that it is solely responsible for its employees (and those of their contractors). This includes, without

limitation, any liability that may arise in relation to termination (including severance obligations) or re-assignment however arising of any such employees that occurs in anticipation of or as consequence of this MSA or any SOW and irrespective of whether such termination or re-assignment may take place before, after or during the Term. (References to "employees" of Client shall include employees of the Authorised Affiliates and their contractors for the purposes of this provision and the employee indemnity in the provision below).

13.8. **Employee Indemnity:** Each party (the "**First Party**") shall indemnify and hold the other party and its Affiliates, directors, agents and contractors ("**Indemnified Parties**") harmless against any claims, demands, awards, loss, damage or expenses (including reasonable legal and other professional fees together with Taxes thereon) whatsoever and however incurred by any of the Indemnified Parties without limitation relating to any claims from by or on behalf of any current or former employees or contractors of the First Party and/or the First Party's contractors:

13.8.1. Alleging that the contract of employment or engagement of any such person transferred to any of the Indemnified Parties, whether under the Transfer of Undertakings (Protection of Employment) Regulations 2006, EU Council Directive 2001/23/EC ("**Directive**"), or any domestic law implementing the Directive (or any directive of similar effect) in any jurisdiction to which the Directive relates, or under any other law providing for the transfer of employment contracts in a situation involving a transfer of an undertaking or services (together, the "**Transfer Laws**"); and/or

13.8.2. Alleging (including but not limited to) breach of contract, unfair dismissal, discrimination or failure to inform and consult and elect employee representatives as may be required under the Transfer Laws (including whether or not such claims relate to an act or omission of an Indemnified Party) or any other matter related to such person's employment or engagement, including any claim relating to remuneration, employee benefit plans, severance and/or redundancy pay, and any other termination liabilities including notice.

13.9. **No Partnership:** Nothing in this MSA or any SOW shall be construed to constitute either party as being the partner or agent of the other and no party is authorised to bind the other or to incur liabilities or make representations on its behalf.

13.10. **Counterparts:** This MSA and each SOW shall become legally binding when both parties to it sign and deliver to the other one or more copies of it. It is not necessary for each party to sign the same counterpart.

13.11. **Interpretation:** Words importing the singular include the plural and vice versa and words importing gender include any other gender. Headings are for ease of reference and shall not affect the meaning of the provisions to which they relate.

13.12. **Statutes:** References to any statute or statutory provisions shall include any statute or statutory provisions which amends, extends, consolidates or replaces the same and shall include any orders, regulations, instruments or other subordinate legislation made under the relevant statute.

13.13. **Third parties:** A person who is not a party to this MSA or any SOW may not enforce any of its terms by virtue of the Contracts (Rights of Third Parties) Act 1999. To avoid doubt, only Client may bring proceedings against Tungsten Network, whether on behalf of an Authorised Affiliate or on its own behalf.

13.14. **Publicity:** Tungsten Network may make a public announcement concerning the existence of this MSA if required, or it considers necessary, to comply with its obligations under any securities laws, including in relation to the Admission and Disclosure Standards and AIM Rules of the London Stock Exchange, the Financial Services Markets Act 2000 (and any regulations or rules made pursuant to it).

Subject to the Clients' consent (not to be unreasonably withheld or delayed) Tungsten Network may list Client on its customer list and refer to that customer list in sales and marketing activities. The parties shall agree the wording for a press release for issue following signature of this MSA and/or any SOW.

13.15. **Dispute resolution:** The parties agree that, in the event of a dispute or alleged breach of this MSA or any SOW, directors or other senior representatives of the parties with authority to settle the dispute will work together in good faith to try to resolve the matter. The parties shall allow such internal escalation a period of not less than 30 days prior to resorting to litigation. This provision shall not apply to disputes involving non-payment of fees, confidentiality or infringement of intellectual property in which case either party shall be free to seek available remedies.

13.16. **Governing Law:** This MSA and any SOW and performance under the same shall be governed by the laws of England and Wales and the parties hereby submit to the exclusive jurisdiction of the English courts.

13.17. **Agent for service:** If Client is not incorporated in the United Kingdom, it shall without delay after entering into this MSA notify Tungsten Network of the name, address, telephone and facsimile numbers of its agent in the United Kingdom for service of proceedings. If such agent's details change, or the agent is replaced,

Client shall forthwith notify Tungsten Network of the new details.

- 13.18. **Export Compliance:** Each party confirms that it is not named on any U.S Government list of persons or entities prohibited from receiving exports and Client confirms the same is the case for each of its Authorized Affiliates and Client shall not and shall not permit its Authorized Affiliates or Client Users to access or use the TN Network services in violation of

any applicable U.S export control and trade sanctions laws, rules and regulations. Tungsten Network reserves the right not to deal with any supplier of Client or any Authorized Affiliate that is located in a jurisdiction that is subject to any government embargo or is noted on any government restricted party list.

**IN WITNESS WHEREOF** this Master Services Agreement has been executed by the following duly authorised representatives:

Tungsten Network Limited Signature	Client Signature
Title of Signatory and Date	Title of Signatory and Date



## SCHEDULE 1: DEFINITIONS

<b>“Affiliate”</b>	means: (a) any subsidiary of a party; and (b) any other entity in which a party (or a subsidiary of a party) holds fifty per cent (50%) or more of the issued share capital (or similar interest in the case of unincorporated entities) and over which that party exercises management control.
<b>“Authorised Affiliates”</b>	means those Affiliates of Client that are listed or referenced in any SOW as <b>“Authorised Affiliates”</b> for the purposes of the services being provided under that SOW.
<b>“Client Users”</b>	means employees, agents or sub-contractors that are authorised from time to time by Client/Authorised Affiliates to access the TN Network on their behalf.
<b>“Content”</b>	means all information submitted to the TN Network by Client, any Authorised Affiliate or any Client User or by any of supplier of Client/Authorised Affiliate for transmission to Client/ Authorised Affiliate.
<b>“Database”</b>	means the secure structured database containing Tungsten Network customer profiles stored in electronic form on the TN Network Servers.
<b>“Data Controller”</b>	means the person which, alone or jointly with others, determines the purposes and means of the Processing of Personal Data.
<b>“Data Processor”</b>	means the person which processes Personal Data on behalf of the Data Controller.
<b>“Data Warehouse”</b>	the secure structured database containing invoice data stored in electronic form on servers owned or under the control of Tungsten.
<b>“Documentation”</b>	means the documentation accompanying the TN Network in both printed and electronic form and inclusive of help pages and related contextual material available when accessing the TN Network.
<b>“Effective Date”</b>	means [the date on which this MSA is made as stated at the beginning of the MSA] OR [ ].
<b>“E-Invoice Compliant Countries”</b>	means the countries enabled for tax compliant invoicing as listed in the <b>“Tungsten Network E-Invoicing Compliant Countries”</b> document.
<b>“Force Majeure Event”</b>	has the meaning given in clause 12.5.
<b>“Harmful Code”</b>	means any code that may:(a) interrupt, damage, destroy or limit the functionality of another's computer hardware, software or telecommunications equipment; (b) cause the loss or corruption of data; and/or (c) compromise the confidentiality, integrity or availability of any relevant Tungsten Network services, including without limitation, a virus, Trojan horse, worm, corrupted files, and/or any other similar software or programs.
<b>“TN Network”</b>	means Tungsten Network’s proprietary invoice (including credit notes) delivery and management system including but not limited to the Data Warehouse, the Database, the TN Network Servers, the web-based invoice generator, the TN Network web-based Portal, the Documentation and the TN Network services specified in any SOW.
<b>“Tungsten Network Servers”</b>	means Tungsten Network’s proprietary computer upon which the Database is stored.
<b>“Personal Data”</b>	means any information relating to an identifiable living individual that is Processed by Tungsten Network for Client or an Authorised Affiliate as a result of, or in connection with, the provision of specified Tungsten Network services to the Client; an identifiable individual is one who can be identified, directly or indirectly, in particular by reference to an identification number or to one or more factors specific to his physical, physiological, mental, economic, cultural or social identity.
<b>“Portal”</b>	means a key component of the TN Network that makes available certain services by means of an internet web based application. The range of services depends on the each client’s configuration and functionality subscribed to. Access to the

Portal is controlled by secure login with user rights managed by each client according to their security preferences.

**“Processing”, “Process” and “Processed”**

means any operation or set of operations which is performed upon Personal Data, whether or not by automatic means, such as collection, recording, organisation, storage, adaptation or alteration, retrieval, consultation, use, disclosure by transmission, dissemination or otherwise making available, alignment or combination, blocking erasure or destruction.

**“Sensitive Personal Data”**

means Personal Data revealing racial or ethnic origin, political opinions, religious or philosophical beliefs, trade union membership, data concerning health or sex life and data consisting of information as to the commission or alleged commission of any offence or any proceedings for any offence or alleged offence or the disposal of such proceedings or the sentence of any court in such proceedings; data relating to investigations, enquiries or disclosures for law enforcement purposes.

**“Taxes”**

means any taxes (including but not limited to VAT or equivalent sales tax), duties, import and export fees, and any other charges or assessments established by any government agency or other regulatory body which are applicable to performance under this MSA or any SOW (but excluding taxes based on Tungsten Network’s income, property or employees).

**“Term”**

has the meaning given in clause 4.

Subject to Contract. Draft dated: [ ] Note: Delete on version prepared for signature.

## Statement of Work Reference:

Entered into under the Master Services Agreement between Tungsten Network Limited (“**Tungsten Network**”) and [ ] (“**Client**”) with an Effective Date of [ ] (the “**MSA**”).

This Statement of Work (“**SOW**”) and schedules and appendices form part of the MSA. In the event of conflict between the provisions of this SOW and those of the MSA, the provisions of this SOW will govern. Capitalised terms used and not defined in this SOW have the meanings assigned to them in the MSA. Definitions for terms defined in this SOW are contained in the SOW and the relevant Schedules. References to schedules are references to the schedules of this SOW unless stated otherwise.

### 1. DEFINITIONS

"Optional Services"	means those functional capabilities and services described as “Optional” functional capabilities or services in the relevant Service Specification.
"Services"	means the “Tungsten Analytics Service” specific terms applicable to which are further described in Schedule 1 of this SOW, and the “e-Invoicing Service” and the “Purchase Order Service”, specific terms applicable to which are further described in Schedule 2 of this SOW.
"Service Specifications"	means Tungsten Network's then-current service specification for the Services and any updates of the same provided to the Client from time to time or in accordance with this SOW.
"SOW Term"	means three (3) years from the Start Date.
"Start Date"	is [ ] 201[ ].
"Supplier"	means a supplier of goods or services to Client and/or any of Authorised Affiliate that is licensed to use the TN Network.

### 2. START DATE AND TERM

This SOW starts on the Start Date and continues (subject to early termination under the provisions of the MSA or this SOW) for the SOW Term.

### 3. THE SERVICES

Tungsten Network will provide the Services, on the terms of this SOW, the relevant schedule and the MSA, and substantially in accordance with the relevant Service Specification, during the SOW Term. In the event of conflict between the provisions of this SOW and those of the Service Specification, the provisions of this SOW will govern.

### 3. AUTHORISED AFFILIATES FOR THE PURPOSES OF THIS SOW

The Authorised Affiliates that may access and use the Services are those Affiliates of Client that are (and, throughout the SOW Term, remain) each an Affiliate of Client and are [located and registered for taxes in [ ]].

### 4. FEES

- 4.1 Fees shall be invoiced and paid in accordance with Schedule 3 (*Fees*) and clause 5 (*General Payment Terms*) of the MSA.
- 4.2 Tungsten Network will not increase the amounts of the Fees payable during the SOW Term. The amounts of these fees are stated in Schedule 3 (*Fees*).
- 4.3 The billing entity for all fees under this SOW is Client. [Client confirms that it has accurately completed Tungsten Network's standard billing form] **OR** [The Client's billing details for payment of fees under this SOW are]:

4.3.1 [The address stated in the MSA] **OR** [Insert company's address if different to Client address in MSA].

4.3.2 Billing contact details:

Contact Type	Name	Telephone/E-mail
Billing (i.e. recipient)		
Accounts Payable (i.e. payment)		
Approval (i.e. approves payment)		
Escalation		

4.3.3 Client Vat number [ ] [required if Tungsten Network Ltd is billing a Client in the EU].

4.3.4 [Insert Client purchase order number for the fees payable in year 1 of the SOW] **OR** [Client will provide Tungsten Network with a purchase order number for the fees payable in year 1 of the SOW within [three (3) days] of the Start Date].

- 4.4 Client will provide Tungsten Network with a purchase order for the fees payable in years 2 and 3 of the SOW at least five (5) weeks prior to the beginning of the relevant year (but failure to do so will not prevent Tungsten Network from invoicing or entitle Client to delay payment).
- 4.5 The currency for all fees payable under this SOW is [Pounds Sterling].

**IN WITNESS WHEREOF** this SOW has been executed by the following duly authorised representatives:

**Tungsten Network Limited Signature**

**Client Signature**

**Title of Signatory and Date**

**Title of Signatory and Date**



## Schedule 1:

### Terms applicable to the Service known as “Tungsten Analytics Service”

#### 1. DEFINITIONS AND PRECEDENCE

<b>"Content"</b>	means for the purposes of this Schedule, invoice data and purchase order data input into the TN Network from time to time by or on behalf of Client, any Authorised Affiliate and/or any Supplier.
<b>"Output"</b>	means reports and management information generated from time to time using the functionality of the Service.
<b>"QlikTech"</b>	means QlikTech UK Limited.
<b>"Schedule"</b>	means this Tungsten Analytics schedule 2 of the SOW.
<b>"Service"</b>	means for the purposes of this Schedule the “Tungsten Analytics Service”.
<b>"Service Specification"</b>	means Tungsten Network's then-current online service specification and user guide for this Service as set out on the Tungsten Network Analytics web portal, as updated from time to time.

This Schedule forms part of the SOW. In the event of conflict between the provisions of this Schedule and those of the SOW, other schedules of the SOW and/or MSA, the provisions of this Schedule will govern. Capitalised terms used and not defined in this Schedule have the meanings assigned to them in the SOW. Definitions for terms defined in this Schedule are contained in this Clause 1. References to appendices are references to the appendices of this Schedule unless stated otherwise.

#### 2. THE SERVICE

- 2.1 It is a condition of this Schedule that, in order for Tungsten Network to provide, and for Client to receive, the Service Client must subscribe (if it has not already done so) to Tungsten Network's 'e-Invoicing' service as set out in Schedule 2, which subscription must remain in place throughout the SOW Term.
- 2.2 Client is authorised to access and use the Service and create, download, store, print and use Output in accordance with this Schedule, the Service Specification and the MSA for its internal business purposes only. Use by the Client includes use by up to the number of [non-] concurrent Client Users to which Client is subscribed as set out in the Service Specification, such number not be exceeded without Tungsten Network's prior written permission and provided always that each such person uses the Service exclusively on behalf of Client (and/or, if permitted by clause 3 of the SOW, its Authorised Affiliates) and only for the above purposes.
- 2.3 Client is solely responsible for ensuring that its computer systems meet all the necessary technical specifications to enable Client (and, if permitted by clause 3 of the SOW, its Authorised Affiliates) to access and use the Service and that such computer systems are compatible with the Service.
- 2.4 Except as expressly set out in this Schedule, all rights in and to the Service, but excluding all Content and the content of Output, are reserved to Tungsten Network and its licensors.
- 2.5 Client shall not, directly or indirectly create Internet links to, or 'frame' or 'mirror' the Service on any

other server or wireless or Internet-based device and shall not permit any Client User or other third party to do any of the foregoing.

### **3. CLIENT ACKNOWLEDGEMENTS AND OBLIGATIONS**

- 3.1 Client acknowledges and agrees that the third party technology upon which the Service relies may include proprietary third party software, which is licensed to Tungsten Network and/or its Affiliates pursuant to separate third party agreements. Client acknowledges that the Service currently contains or incorporates proprietary software owned by QlikTech and its Affiliates ("**QlikView Products**"). In relation to such QlikView Products, Tungsten Network is required to include the following terms in this Schedule and to require Client to agree to them. By accessing or using the Service, Client agrees as follows:
- 3.1.1 QlikTech and its Affiliates, or their respective suppliers or licensors where applicable, own and retain all right, title and interest in and to the QlikView Products, and their respective patents, trademarks (registered or unregistered), trade names, service marks, logos, designs, copyrights, trade secrets and confidential information. Client does not acquire any right, title or interest in or to the QlikView Products or any intellectual property rights contained therein.
  - 3.1.2 Client agrees to: (a) comply with all applicable local, state, national and foreign laws and regulations in connection with Client's use of the QlikView Products; and (b) use reasonable security precautions for providing access to the QlikView Products by Client Users and to prevent unauthorized access to use of the QlikView Products.
  - 3.1.4 This Schedule, and Client's rights to access/use the QlikView Products, shall be immediately terminated upon Client's breach of any of the provisions of this clause 3.1 and where QlikTech has advised Tungsten Network that Client is in breach of the applicable provisions and Client has not remedied such breach (if capable of remedy) within a period of 30 days from the date thereof.
  - 3.1.5 The Service may be subject to limitations, delays, and other problems inherent in the use of the Internet and electronic communications. None of Tungsten Network, QlikTech or their respective Affiliates will be responsible for any delays, data loss, delivery failures, or other damage resulting from such problems. Tungsten Network and its licensors (including QlikTech) do not represent or warrant that the use of the QlikView Products will be secure, timely, uninterrupted or error-free or operate in combination with any other hardware, software, system or data.
- 3.2 Client shall indemnify and hold Tungsten Network and its Affiliates harmless against all losses and liabilities suffered or incurred by Tungsten Network and/or any of its Affiliates as a result of any claim by QlikTech arising from Client's or any Client User's breach of this Schedule.

### **4. CONTENT**

- 4.1 Client acknowledges and agrees that the Service is an interrogation and reporting tool which enables Client Users to generate Output which relies upon and derives from Content of which Tungsten Network is not the source and, as such, Tungsten Network is not responsible for, and makes no representation and gives no warranty as to the accuracy, completeness, currency, correctness, reliability, integrity or quality of any such Content or, to the extent derived from it, any Output, and accepts no liability for any loss or damage of any kind incurred as a result of Client, Authorised Affiliate or any Client User or other third party relying on any Output.

- 4.2 Client acknowledges and agrees that Tungsten Network is not the source of the Content (which derives from third parties, including Suppliers). Client confirms that there are no legal, regulatory, contractual or other restrictions which prevent or restrict any Content being used to generate Output as envisaged by the Service and Client shall indemnify (on its behalf and on behalf of any Authorised Affiliates) and hold Tungsten Network and its Affiliates harmless against all losses and liabilities suffered or incurred by Tungsten Network and/or any of its Affiliates as a result of any claim by a third party alleging otherwise.
- 4.3 As between the parties, Output will be treated as confidential information of Client and in accordance with clause 9 (*Confidentiality and Access to Information*) of the MSA.

## **5. TERMINATION**

- 5.1 Tungsten Network may terminate this Service (giving as much notice as reasonable possible) in the event that any agreement between Tungsten Network and/or any of its Affiliates and any third party provider upon whose technology the Service relies is terminated (other than by Tungsten Network and/or its relevant Affiliate for convenience) such that Tungsten Network can no longer reasonably continue providing the Service.
- 5.2 If Tungsten Network fails to meet the Identified Savings Level for all of the months in the Free Period, Client shall have the option to terminate the Service under this Schedule upon 30 (thirty) days' notice in writing, such notice to be served no later than 30 days after the end of the Free Period. To avoid doubt, termination under this clause 5.2 shall be treated as termination without fault on the part of Tungsten Network. ("Identified Savings Level" and "Free Period" are defined in Schedule 3 (Fees)).
- 5.3 This Schedule and the Services hereunder will terminate automatically if Client's subscription to the Tungsten Network's e-Invoicing subscription terminates or expires.
- 5.4. Upon termination or expiration of this Service, Client and all Client Users shall immediately cease all further access to and use of the Service. For the avoidance of doubt, Output previously stored the Service will no longer be available after termination or expiration of this Service.

## Schedule 2: Terms applicable to the Service known as e-invoicing, and Purchase Order Services

### 1. DEFINITIONS AND PRECEDENCE

<b>“Approved Data Transmission Options”</b>	means the then current connectivity and data transmission methods supported by Tungsten Network for the purposes of data transmission and as amended from time to time by Tungsten Network. Details of the current options are set out in the Tungsten Network document referred to in the e-Invoicing Service Specification called “File Delivery Options OP.REF.004.001”, a copy of which has been provided to Client. Updates to the options are available from Tungsten Network support on request. To avoid doubt, Tungsten Network provides the software and supports these methods for its end of the connection only (i.e. within the TN Network environment) and Client will need to take the necessary steps to obtain any required software and provide support to them for their end of the connection (i.e. within their own environment).
<b>“Benchmark Transaction”</b>	means a Good Transaction submitted by Tungsten Network to confirm the performance of the TN Network for the purposes of measuring the mean performance of the TN Network against sender to receiver service levels. As a minimum four (4) transactions (based on Good Transactions) per hour are benchmarked by Tungsten Network.
<b>“Core Hours”</b>	mean 8.01 p.m. Sunday to 7.59 a.m. Saturday, UK time.
<b>“Core Services”</b>	means those functional capabilities and services described as “Core” functional capabilities and services in the relevant Service Specification.
<b>“Good Transaction”</b>	means a standard invoice that is received by the TN Network from a defined sender in an approved manner and format conforming to the relevant supplier profile. The standard invoice is processed along with invoices for all other senders and receivers. The Good Transaction is routed to a defined receiver and a receiver file is created and delivered to a defined recipient using an Approved Data Transmission Option.
<b>“Live Month”</b>	means: (i) the first calendar month <b>after</b> the month in which the first live invoice is processed under the Schedule; and (ii) each calendar month thereafter that ends during a relevant annual period and in which invoices are transmitted to the TN Network for processing under this Schedule (or would have been but for a lack of availability/achievability of the Service Availability Level service components during Core Hours).
<b>“Mandatory Country”</b>	means a country where by Government mandate, the use of electronic invoices is obligatory to both senders and receivers of invoices. In such a country, the exchange of electronic invoices between trading parties or between service providers is inevitable. Tungsten Network will provide a validation service of such legal invoices to the validity of invoices received through such channels.

<b>“Processing Service Level”</b>	is defined in paragraph 5.4 of part 1 of Appendix 1 to this Schedule.
<b>“Schedule”</b>	means this e-Invoicing Service and Purchase Order Service under Schedule 2 of the SOW.
<b>“Services”</b>	means the e-Invoicing Service, and the Purchase Order Service and as further attached in Schedule 2 of this SOW.
<b>“Service Availability Level”</b>	is defined in paragraph 5.2 of part 1 of Appendix 1 to this Schedule.
<b>“SL Credit”</b>	is defined in paragraph 6.1 of part 1 of Appendix 1 to this Schedule.
<b>“Third Party Service Provider”</b>	is defined in section 5.1.
<b>“Third Party Suppliers”</b>	is defined in section 5.1.
<b>“Transaction”</b>	means each invoice or credit note processed by Tungsten Network from a Supplier/Third Party Supplier pursuant to this Schedule.
<b>“Web Form”</b>	is a part of the TN Network portal that enables a Supplier to manually enter and submit an electronic invoice to the Client/Authorised Affiliate via the TN Network.

This Schedule forms part of the SOW. In the event of conflict between the provisions of this Schedule and those of the SOW, other schedule of the SOW and/or MSA, the provisions of this Schedule will govern. Capitalised terms used and not defined in this Schedule have the meanings assigned to them in the SOW. Definitions for terms defined in this Schedule are contained in this Clause 1. References to appendices are references to the appendices of this Schedule unless stated otherwise.

## **2. SERVICE LEVELS AND EXTENT OF RIGHTS TO USE**

- 2.1 Service levels (and rights to claim credits for failure to meet them) for the Services are stated in Appendix 1.
- 2.2 Performance levels for paper invoice conversion targets for the Services (and rights to claim credits for failure to meet them) are stated in Appendix 1.
- 2.3 Client is authorised to use the Services in accordance with this Schedule and the MSA in the regular course of its business.
- 2.4 Client will provide Tungsten Network with the necessary information to prepare and maintain its Tungsten Network profile(s) which Tungsten Network is entitled to rely on as being accurate and complete. Tungsten Network may process, copy and use the Content, and the information contained in the TN Network profile(s), for the purposes of providing the Services under this or any SOW and/or Schedule (including providing relevant information to Suppliers) and Client confirms that it is responsible for ensuring the accuracy and completeness of, and has the right to transmit, all data that it, any Authorised Affiliate or Client User submits to the TN Network, including any Content.

## **3. SUPPLIER ENROLMENT**



- 3.1 Client authorises Tungsten Network to contact, deal and share information with its prospective in-scope suppliers for the purposes of this SOW and shall provide Tungsten Network with reasonable assistance to facilitate the supplier enrolment services.
- 3.2 Tungsten Network is not responsible for acts or omissions of the current or prospective Suppliers/ Third Party Suppliers.
- 3.3 Client will not release any supplier that is located in a jurisdiction that is subject to any government embargo or is noted on any government restricted party list. Tungsten Network reserves the right not to deal with any supplier of Client or any Authorised Affiliate that is located in a jurisdiction that is subject to any government embargo or is noted on any government restricted party list.
- 3.4 The type of e-Invoicing Service provided for each Supplier will depend upon the geographic location of the Supplier (as further described in the "e-Invoicing" Service Specification and the e-Invoice Compliant Countries document both of which are attached and form part of this SOW).
- 3.5 In the event there is any change to the "Tungsten Network e-Invoice Compliant Countries" and/or "Tungsten Network Commercial Data Transfer Service Countries" as set out in the e-Invoice Compliant Countries document, the parties acknowledge that it may be necessary to modify the terms of this SOW and/or MSA and/or relevant Service Specification (including pricing) to reflect such changes.
- 3.6 The parties further acknowledge that certain jurisdictions may be subject to local requirements impacting on how e-Invoicing is provided in a particular country which may be different to the standard service model. Current differences in these countries are summarised in the e-Invoice Compliant Countries document, and are outlined in detail in the "Local Country Compliance Guide" copies of which are available on the Portal and will be provided to the Client as part of implementation. Tungsten Network will make updated copies of those documents available to the Client on the Portal (<https://portal.ob10.com/forms/ComplianceGuide.aspx>). The parties shall therefore discuss and agree in good faith any changes to the MSA, this SOW or any Service Specification (including changes to the terms, pricing, and service descriptions under the same) reasonably required in order to implement such local requirements and any updated local requirements (such agreement not to be unreasonably withheld or delayed by either party).

#### 4. CONTENT

Client is responsible for checking and approving Content to satisfy itself that it can rely on it as being accurate and complete. Tungsten Network is not responsible for verifying the accuracy of Content. Tungsten Network confirms it will not modify, supplement remove and/or otherwise edit Content, other than for the purposes of formatting, validation, translating and/or augmenting the Content as expressly stated in the relevant Service Specification. All commercial/legal terms relating to the commercial transactions to which the Content relates are solely between Client/the relevant Authorised Affiliate and the Supplier/ Third Party Supplier.

#### 5. INTER-OPERATION VIA THIRD PARTY NETWORK

- 5.1 During supplier enrolment, the parties may agree that Tungsten Network delivers invoice data from certain suppliers ("**Third Party Suppliers**") who have existing arrangements with another electronic invoice provider ("**Third Party Service Provider**") which Tungsten Network has an inter-connection link with.
- 5.2 While Tungsten Network takes reasonable steps to establish an inter-connection link with responsible

and reputable Third Party Service Providers, they are not sub-contractors or agents of Tungsten Network and therefore: (i) Tungsten Network is not responsible (and has no liability) for the Third Party Provider's acts or omissions or any breach of this SOW or the MSA as a result of those acts or omissions; and (ii) Tungsten Network is not responsible for generating or creating the tax invoice of, or obtaining any required consent and authority of, the relevant Third Party Suppliers. Accordingly, Tungsten Network cannot guarantee tax or legal compliance as the tax invoice is not generated by Tungsten Network and the applicable laws warranty stated in 8.1.6 of the MSA does not apply to data processed by Tungsten Network from a Third Party Supplier.

- 5.3 Tungsten Network is required to notify the Client that a Third Party Service Provider has no responsibility for the invoice content of the invoices submitted by the Third Party Suppliers (or to verify the accuracy of the same).
- 5.4 Client acknowledges that Tungsten Network is under no obligation to continue to inter-connect with any Third Party Service Provider(s) and its agreement to inter-connect with them is confidential and will not be disclosed by Client/Authorised Affiliate.
- 5.5 To avoid doubt the provision of clauses 5.1 to 5.4 do not apply in any Mandatory Country.

## **6. TERMINATION**

- 6.1 In addition to the termination rights in clause 12 of the MSA, Client may terminate this Service immediately on written notice to Tungsten Network if:
  - 6.1.1 over any consecutive four (4) calendar month period, Tungsten Network fails to achieve a Service Availability Level and/or a Processing Service Level of 98.5% in each Live Month occurring in that period due to any reason for which Tungsten Network is liable in accordance with the terms of this Schedule; or
  - 6.1.2 Tungsten Network fails to achieve a Service Availability Level and/or a Processing Service Level of 98.5% in more than six (6) Live Months in any annual period (the first such annual period to commence on the Start Date) due to any reason for which Tungsten Network is liable in accordance with the terms of this Schedule.
- 6.2 If the Services under the Analytics Schedule 1 is terminated by Tungsten Network for breach by Client of its obligations under such Schedule 1, Tungsten Network may terminate this Service.

## **7. EFFECTS OF TERMINATION**

Client/Authorised Affiliates will not be permitted access to the TN Network in relation to items stored pursuant to this Schedule after termination or expiration of this Schedule.

# Appendix 1: Service Levels, Paper Invoicing Targets and Credits

## PART 1: SERVICE LEVELS AND SERVICE CREDITS

### 1. SCOPE

Any software, equipment or services not supplied by Tungsten Network (including any custom data transmission options that do not fall within the definition of Approved Data Transmission Options) are outside the scope of these service levels.

### 2. SERVICE LEVEL REPORTS

A summary report detailing the Service Availability Level and Processing Service Level achieved in a calendar month is made available on the Tungsten Network website. Client can access its summary reports by accessing <http://www.tungsten-network.com/stats/>.

### 3. CONFIRMED CONTACTS

- 3.1 Contacts to whom planned maintenance and other information concerning the e-Invoicing Service will be communicated must be specified by Client. The four types of contact Tungsten Network holds are system alerts, technical, accounts and administrative. For each contact Client should supply a name, job title, email address and optionally, a telephone number.
- 3.2 This list of confirmed contacts should be provided to Tungsten Network during project kick off and kept up to date by Client.
- 3.3 Client agrees to communicate any changes to this list at the earliest opportunity via Tungsten Network's web-based ticketing system.

### 4. PLANNED MAINTENANCE

- 4.1 Not less than forty-eight (48) hours' notice of planned maintenance will be given to Client confirmed contact email addresses.
- 4.2 Planned maintenance is maintenance that is carried out between the hours of 08.00 Saturday - 20.00 Sunday, UK time.

### 5. SERVICE LEVELS

#### Service Availability Level

- 5.1 The TN Network has a target level for availability for the following service components of 98.5% of whole minutes during Core Hours in a Live Month (the **"Service Availability Level"**):

- 5.1.1 The TN Network allows Suppliers to upload files or key- enter invoices for Client/Authorised Affiliates.
- 5.1.2 The Approved Data Transmission Options process data where data is available for processing.

#### **Processing Service Level**

- 5.2 Tungsten Network has a target level for the processing of Good Transactions end-to-end within four (4) Core Hours in 98.5% of cases and within eight (8) Core Hours in 100% of cases (the “**Processing Service Level**”). This is measured by reference to Benchmark Transactions across the Live Month.

### **6. SERVICE CREDITS REGIME FOR FAILURE TO MEET SERVICE LEVEL TARGETS**

- 6.1 If the target of 98.5% is not achieved for either the Service Availability Level or the Processing Service Level during a Live Month in an annual period of the SOW Term, then Client may claim a credit in accordance with the scoring mechanism described below (the “**SL Credit**”). If claimed, these would be applied as a discount against the instalment of the Annual Fee payable for the following annual period of the SOW Term (or as a rebate at the end of year 3 if no renewal is agreed). Annual periods run consecutively, beginning on the Start Date and each anniversary of the Start Date.
- 6.2 The total amount of the SL Credits in relation to any failure to achieve the 98.5% target for both the Service Availability Level and the Processing Service Level in the Live Months in each annual period is limited (in aggregate) to 10% of the Annual Fee paid by Client to Tungsten Network for the relevant annual period.
- 6.3 The SL Credits will be calculated as follows (subject to the limit referred to in paragraph 6.2 above):
  - 6.3.1 If the Service Availability Level or the Processing Service Level falls below 98.5% in any Live Month ending in a relevant annual period due to any default by Tungsten Network of the terms of the Schedule, then for each whole % point by which the Service Availability Level or the Processing Service Level in that Live Month falls below 98.5%, one (1) SL Credit will be awarded against Tungsten Network.
  - 6.3.2 Each SL Credit is equal to ½ % of the Annual Fee for the relevant annual period.
- 6.4 SL Credits must be claimed by Client within thirty (30) days of the end of each relevant Live Month in which the failure occurs.
- 6.5 Client’s right of termination in section 6 of the Schedule and the SL Credits referred to above, are the sole rights of the Client (and the sole liability of Tungsten Network) in relation to under performance against or failure to meet the Service Availability Level or the Processing Service Level during the SOW Term.

## PART 2: PAPER INVOICING CONVERSION TARGETS AND CREDITS

### 1. SNAP SHOT SUMMARY TABLE

Wave	Release Period (of SOW)	Date Measured (of SOW)	What is Measured	Tungsten Network Target	Consequence of Missing Target
Wave 1A	Months 1-6	End Month 18	% of invoices received by Client in Month 18 from in-scope suppliers released in Wave 1 Measured Campaigns that are processed by Tungsten Network (Note: This excludes suppliers removed from scope)	55%	Annual Fee payable for year 3 of the SOW will be discounted by 10%
Wave 1B	Months 1-6	End Month 30	% of invoices received by Client in Month 30 from in-scope suppliers released in Wave 1 Measured Campaigns that are processed by Tungsten Network (Note: This excludes suppliers removed from scope)	70%	Rebate equal to 10% of the Annual Fee paid for year 3 of the SOW will be given (payable at end of SOW Term/ applied as a discount against the annual fee for year 1 of the renewal term where Client elects to renew at the end of the SOW Term)

### 2. WHAT WILL TUNGSTEN NETWORK MEASURE FOR PAPER INVOICING CONVERSION TARGETS?

- 2.1 The **volume of invoices** processed by the TN Network for the Client/Authorised Affiliates from the suppliers released in the Measured Campaigns for the Wave.
- 2.2 A Client can release its suppliers for enrolment onto the TN Network in other ways (such as via a “direct campaign” i.e. a campaign that assumes self-enrolment by the supplier via the Web Form (with no human follow up by Tungsten Network); or a campaign that is managed by Tungsten Network but that does not comply with Tungsten Network Best Practice Principles, that does not meet the supplier number/ invoice volume requirements or that does not contain a Strong Mandate Message). Tungsten Network will still seek to enrol those suppliers; but they will not be included for the purposes of measuring compliance with the paper invoicing conversion targets.
- 2.3 To avoid doubt, (i) the Client acknowledges that this Paper Invoice Conversion Target and the credits applicable herein will only apply if the Client has implemented and enabled the invoice status component of the e-invoicing Service and (ii) Suppliers that are located in a country which is a Mandatory Country (currently Mexico, Turkey and Brazil) are out of scope for the purposes of this paper invoice conversion target. Please see the e-Invoicing Compliant Countries document for further details.

### 3. WHAT IS A MEASURED CAMPAIGN?

- 3.1 A **simultaneous** release by Client to Tungsten Network of a minimum of **100** suppliers located in an e-Invoice Compliant Country, each such supplier having expected annual invoice volumes of **30** or more invoices with an annual aggregate value of **£30k** or more, **unless** the supplier is located in an English



speaking country and submits invoices in English, in which case the volume requirement reduces to **12** or more invoices with an annual aggregate value of **£12k** or more.

- 3.2 A campaign that complies with the “Best Practice Principles”.
- 3.3 Where the Client gives all of the suppliers in that release a “**Strong Mandate Message**”: i.e. a strong message that has been approved by Tungsten Network (e.g. supplier is expected to support this initiative), contains a deadline (e.g. supplier is to use Tungsten Network within three (3) months of request) and contains a consequence (e.g. paper invoices will be returned after that deadline).
- 3.4 Client can make any number of Measured Campaign releases in the release period for that Wave. Each one will count as a Measured Campaign for that Wave and the results of all of them will be aggregated to measure if Tungsten Network has achieved the paper invoicing conversion target for the Wave.

#### **4. WHAT ARE THE TN NETWORK BEST PRACTICE PRINCIPLES?**

- 4.1 Client provides Tungsten Network with the form of release letter to be used (prior to release) to enable Tungsten Network to assess whether it contains a Strong Mandate Message and what category of suppliers will be targeted (30 invoices or 12 invoices).
- 4.2 Client simultaneously sends/releases a letter to 100 or more suppliers that satisfy the requirements of paragraph 3 asking them to join the TN Network.
- 4.3 The letters are sent / released within the first six (6) months of SOW, for Wave 1.
- 4.4 The letters confirm the dates when the supplier must: (a) have made the “service type” choice (i.e. integrated or Web Form), which must be within six (6) weeks of sending; and (b) be live (i.e. invoicing) on the TN Network, which must be within three (3) months of sending.
- 4.5 The letters must illustrate the benefits of the supplier joining the TN Network.
- 4.6 The letters must outline the consequences to the supplier if it elects not to submit invoices via the TN Network.
- 4.7 The letters must be e-mailed to at least one current named contact of the supplier, or if that contact information is not available/complete/reliable, then Client must “cleanse” the supplier contact database to accurately update it (or enlist Tungsten Network to do this for it).
- 4.8 Client communicates the TN Network to its “buying community” to support the use of the TN Network with its suppliers.
- 4.9 Client has a robust “Refer to Buyer” process in place, where the Client liaises directly with the supplier if it does not comply with Client’s request to participate in the programme within five (5) weeks of its non-compliance being flagged.
- 4.10 Client returns any supplier that has been “Referred to Buyer” to Tungsten Network for enrolment within five (5) weeks of its non-compliance being flagged, or removes that supplier from scope, (and Tungsten Network right to deem any referral outstanding for more than five (5) weeks as being removed from scope).

## 5. MEASUREMENT

- 5.1 A report for the Wave showing the number of invoices received by Client in the relevant measurement month from the suppliers released in Measured Campaigns during the Wave. Invoices from suppliers removed from scope must not be included.
- 5.2 The reports must be provided to Tungsten Network within thirty (30) days of the end of the relevant measurement month.
- 5.3 The Client will provide Tungsten with appropriate supporting information on request and Tungsten may audit this information if required.
- 5.4 If Tungsten does not receive the reports containing the required information by the relevant date it will not be able to measure its achievement against target and Tungsten shall be deemed to have achieved the relevant target and no discount/rebate will apply.
- 5.5 The discounts/rebates referred to in the table above are a sole remedy for failure to achieve targets.

## 6. EXAMPLE CALCULATION:

***For first measurement of Wave 1A:*** Wave 1A consisted of 2 Measured Campaigns. The Annual Fee for year 3 of the SOW Term is £100,000. The first measurement of these Measured Campaigns will occur at the end of month eighteen (18) of the SOW Term. Target that will apply is **55%**.

*Total Number of Wave 1A Measured Campaign Invoices received by Client in month 18 = 7,000.*

*Total Number of Wave 1A Measured Campaign Invoices processed by Tungsten in month 18 = 3,000.*

*Stated target is 55%.*

*Actual target achieved by Tungsten is 42.8%.*

*A service credit of £10,000 will be discounted against the Annual Fee payable for year 3 of the SOW Term.*

## Schedule 3: Fees

### 1. DEFINITIONS

<b>“Free Period”</b>	means the period running until the earlier of (i) six (6) months from the Start Date and (ii) three (3) months from the Go-Live Date.
<b>“Go-Live Date”</b>	means the date on which the first Transaction is processed.
<b>“Spend”</b>	means for any period, the total, aggregate value (including VAT or other applicable taxes) of all invoices analysed by the Tungsten Analytics service for Client/Authorised Affiliates during the relevant period.

Capitalised terms used and not defined in this Schedule have the meanings assigned to them in the SOW.

### 2. FEE DETAILS

Tungsten Network will provide, and Client agrees to purchase, the Services from the SOW Start Date for the relevant SOW Term for the fees stated in the table in Clause 2 below.

Services			
Period	Fee	Payment due	Payment term
<b>Annual Fee</b>	£37,000	Due Start Date and each anniversary of the Start Date.	Within 30 days of invoice.
<b>Monthly Fee</b>	0.25% of Spend in the relevant month.	Monthly in arrears for each month after the Free Period for the remainder of the SOW Term.	Within 30 days of invoice.

- 2.1 For the avoidance of doubt, the Annual Fee detailed above includes: (i) activation and maintenance of the e-Invoicing Service and the Purchase Order Service on one (1) ERP and one (1) invoice PO creation environment, (ii) supplier on-boarding, enablement and support and (iii) all project management, technical consulting and campaign management time (excluding travel and expenses).
- 2.2 One Tungsten Network profile is provided as standard. Client requirements for additional profiles or changes to its profiles will be carried out under the Time and Materials Assistance Service as detailed in the relevant Specification and an estimate will be submitted to Client for approval before work is commenced.

- 2.3 For the avoidance of doubt, the Fees set out above, do not include fees for the Optional Services. If Client elects to purchase and use any Optional Services, the scope, parameters and charges will be defined and delivered as outlined in a separate statement of requirements agreed in writing by Tungsten Network and Client. Unit Pricing is quoted for the following Optional Services:

**Optional Service Fees Unit Pricing Table:**

Optional e-Invoicing Services Fees		Fee(£)	Unit/Notes	Payable
Supplier Data Cleansing (for a minimum of 100 suppliers)			Per supplier	On invoice
With supplier phone numbers provided by Client		7.00		
Without supplier phone numbers provided by Client		8.15		
Postal Mailing (provided for a minimum of 100 suppliers and I done on paper)		2.30	Per pack mailed to a supplier	On invoice
Archiving		0.0063	Per invoice stored per month, from day 91+ from date of storage	Monthly on invoice
Digital Signature Verification		0.05	Per invoice	Monthly on invoice
Connections to additional ERP's or PO Systems		26,000	Each system	On invoice
Data Import/Export		0.0550	Per invoice/credit note	On invoice
File Restoration		POA	Each	On invoice
Supplier Communication Translation		118	Per set up	On Invoice
		0.19	Per Word	
Customer data uploading service for the invoice status component of the e-Invoicing Service.		5,000	Each Installation	On invoice

## Tungsten Analytics Optional Services:

Optional Services	Price	Payable
<b>Contract data.</b> Inputting buyer contract data files to enable contract price variance reporting. Requires mapping and data loading	Time & materials pricing. £1,500 (USD) per day, plus expenses at cost with 20% uplift	On invoice
<b>Non-TN Network data.</b> Historical on non-TN Network data. Requires mapping and data loading	Time & materials pricing. £1,500 (USD) per day, plus expenses at cost with 20% uplift	On invoice
<b>Customised dashboards</b>	Price on application	On invoice
<b>Customised branding</b>	Price on application	On invoice
<b>Cross-border VAT-reclaim service</b>	Price on application	On invoice
<b>Realising savings – procurement consultancy</b>	Price on application	On invoice

### 3. IDENTIFIED TUNGSTEN ANALYTICS SAVINGS

- 3.1 For each of the three (3) months from the end of the Free Period (the “**ISL Period**”) , Tungsten Network shall identify for the Client and Authorised Affiliates, a Price Variance of no less than 0.25% of the Client/Authorised Affiliates’ Spend for each relevant month (the “**Identified Savings Level**”).
- 3.2 “**Price Variance**” for the purpose of this Clause 3 means the difference identified by the Tungsten Analytics Services reporting and spend analysis tool (as further set out in the Service Specification) between the total price paid by the Client for invoiced items from all the Client’s suppliers and what would have been paid by the Client if all invoiced items from all the Client’s suppliers were sourced at their lowest price.
- 3.3 If Tungsten Network fails to identify the Identified Savings Level for the Client/Authorised Affiliates, in any of the three months during the ISL Period, Tungsten Network shall rebate/waive the Monthly Fee for the relevant month (less any less any repayments, other rebates, credits or other deductions paid or payable by Tungsten Network to Client).

### 4. HISTORICAL SAVINGS ANALYSIS FEES

- 4.1 Tungsten Network shall analyse the Client’s historical data from the e-Invoicing Service and other agreed sources (in a format provided by Tungsten Network to Client that Tungsten Network is able to read and analyse) to identify Client supplier invoice price variances that existed prior to the SOW Start

Date or any other agreed period.

- 4.2 Where such price variances are identified, Client shall authorise Tungsten Network, its Affiliates or subcontractors to contact Client's suppliers directly. Tungsten Network and/or its Affiliates and/or its subcontractors shall use reasonable endeavours to attempt to recover the price variance overpayments by Client to such suppliers. Where Tungsten Network, its Affiliates or subcontractors are able to recover such price variance overpayment amounts on behalf of the Client, fifty percent (50%) of such price variance overpayment amounts shall be paid to Tungsten Network by the Client within thirty (30) days of receipt of such amounts by the Client.

# Tungsten Network e-Invoicing and Invoice Status Service

## *Service Specification*

Version: Draft 20140108-TN

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.



## 1. Document usage

This document describes the functional scope of the Tungsten Network e-Invoicing and Invoice Status Service and the Professional and Technical Services provided by Tungsten in support of the service.

## 2. Definition of terms

Term	Definition
"Attachment"	Data in the form of a file related to a specific Invoice that is submitted by a Supplier.
"Customers"	Refers to organisations that either send or receive data via the Tungsten Network.
"Invoice"	A general reference meaning either a Suppliers Invoice or credit note.
"Other Methods"	Refers to all methods for submitting invoices to the Client other than the Tungsten Network e-Invoicing Service; for example, EDI, email, fax, postal.
"PDF Image"	An image rendering created by the Tungsten Network using the data submitted by the Supplier along with the appropriate Client profile data.
"Suppliers"	Refers to organisations that submit invoices to the Client via the Tungsten Network or via Other Methods
"Working Day"	Means Monday to Friday, excluding US Federal holidays and the day after Thanksgiving (for Atlanta) and days when banks in London are closed for business (for London).

Capitalised terms used and not defined in this document have the meanings assigned to them in the MSA or the accompanying SOW. References throughout this document to "Client" also refer to its Authorised Affiliates (as applicable). References to MSA and SOW refer to the accompanying agreement and (if applicable) statement of work in place between Tungsten and the Client in relation to the provision of this service.

## 3. Tungsten Network e-Invoicing & Invoice Status Service overview

The e-Invoicing and Invoice Status Service is an electronic invoice delivery and invoice status service that replaces paper invoice processing with a secure, electronic service that enables Suppliers to submit tax-compliant Invoices to their Clients in a format and structure that the Client's financial, workflow and document management systems can process and the Client to provide suppliers with online access to the processing and payment status of their invoices. There are geographic and language dependencies that impact the level of service provided to Customers.

**Geographic Scope:** The type of service provided depends on the geographic location of the Supplier. For Invoices submitted by Suppliers located in some countries, the Tungsten Network performs a compliance check to ensure that the Invoice qualifies as the legal Invoice of record (e.g. Artifact) based on the country-

specific e-Invoicing regulatory rules. It then creates the legal Invoice on behalf (and with authorisation) of the Suppliers. For a current list of countries enabled for tax compliant invoicing, please refer to the “OB10 e-Invoice Compliant Countries” document.

For Invoices from Suppliers located outside of the Tungsten Network e-Invoice Compliant Countries, the OB10 Network provides a Commercial Invoice Transfer Service which enables the electronic transfer of the commercial Invoice only; for this process the regulatory component of the Tungsten Network compliance check is not performed and the Tungsten Network does not create or process the legal tax Invoice. The Commercial Invoice Transfer Service is a sub-set of The e-Invoicing and Invoice Status Service as documented in the section below headed “Commercial Invoice Transfer Service”.

**Languages:** The e-Invoicing and Invoice Status Service is a language independent service. The OB10 Portal supports the following languages: Bulgarian, Dutch, English (UK and US variants), French, German, Italian, Polish, Portuguese (native and Brazilian variants) and Spanish (native and Mexican variants). Tungsten customer service staff can communicate in these same languages.

In support of the e-Invoicing and Invoice Status Service, Tungsten provides Supplier onboarding, help and support services. Tungsten supplier onboarding staff can communicate in the languages noted above as well as the following additional languages: Chinese (Mandarin & Cantonese) and Malay.

**Service Capabilities:** The e-Invoicing and Invoice Status Service is comprised of a defined set of functional capabilities and professional services. Some are core capabilities and services. Others are optional capabilities and services that may be provided based on the specific requirements of the Client. [The following sections describe these services in more detail.](#)

## 4. Core functional capabilities

### 4.1. Invoice submission

Suppliers use one of three methods to submit their Invoices to the Client via the Tungsten Network as described below,

#### 4.1.1. Integrated file transfer

This method enables Suppliers to export Invoice data directly from their billing systems. Suppliers using this method are called ‘Integrated Suppliers.’

Tungsten creates a profile on the Tungsten Network for each Integrated Supplier. That profile specifies the format and layout that the Integrated Supplier will use to submit Invoices. Upon receipt of the Supplier’s Invoice data, the Tungsten Network initiates a process that will verify the integrity of the incoming record structure, transform the Invoice data from the Integrated Supplier’s format and layout to an internal format utilised by the Tungsten Network to process the Invoice data and store it in the Tungsten Archive.

#### 4.1.2. Online via the Tungsten Network Portal

The online submission method enables Suppliers to submit Invoices via their Tungsten Network Portal account in one of the following ways:

- Using a simple, straightforward online Invoice template for entering Invoice data

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

- By directing the system to populate the online Invoice template with the data from the Client's purchase order

Suppliers using this method are called 'Web Form Suppliers.' Tungsten creates a profile for each Web Form Supplier on the Tungsten Network.

#### 4.1.3. Attachments

The Client can specify Attachment delivery options for some or all of its Suppliers who submit supporting documentation along with their Invoices. Suppliers submit Attachments up to 12MB in size. Based on the Client's rules, the Tungsten Network will determine:

- Which Attachments will be delivered to the Client
- The maximum number of Attachments that can be delivered
- The permitted formats of for Attachment that are delivered (e.g., PDF, XLS, TIFF, etc.)

The e-Invoicing and Invoice Status Service holds Invoices requiring Attachments that have been submitted by Suppliers via file transfer until one of two events occurs:

- The Supplier uploads the Attachments via their Tungsten Network Portal account and releases the Invoice for delivery to the Client, or
- The maximum waiting time for Attachments is reached; in this case the Invoice is delivered to the Client without an Attachment. The waiting time is a Supplier specific setting measured in hours

## 4.2. Compliance checking

Prior to delivery of the Invoice to the Client, The e-Invoicing and Invoice Status Service implements multiple compliance checks to decrease errors and improve Invoice data accuracy. The checks encompass sender rules (e.g., the Supplier), regulatory compliance and receiver rules (e.g., the Client).

#### 4.2.1. Supplier submission compliance check

Invoices are initially checked for integrity and to ensure that the Invoice data conforms to the specifications contained in the profile created for the Supplier. Standard checks are performed to identify duplicates, to ensure that the totals are in balance and to validate that the core data fields required in order to qualify it as a legitimate document are present.

#### 4.2.2. Regulatory compliance check

For Invoices from Suppliers located in the Tungsten Network e-Invoice Compliant Countries, Tungsten performs a compliance check to ensure that we comply with any unique country-specific processing requirements and that the Invoice qualifies as the legal Invoice of record (e.g. Artifact) based on the country-specific e-Invoicing rules and regulations. For each e-Invoice Compliant Country, The e-Invoicing and Invoice Status Service regulatory compliance check:

- Ensures that the Invoice contains all of the data fields required for regulatory compliance
- Digitally signs the Invoice in accordance with the country's regulations
- Stores the Invoice in an approved archiving location; this is either the Tungsten Archive or a geographic-specific archive location conforming to the country's regulations

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

Tungsten works closely with its compliance partner to check and interpret the country-specific compliance requirements within the Tungsten Network e-Invoice Compliant Countries for electronic invoicing and electronic archiving.

Tungsten provides Customers with background information, including country-specific compliance guides. This enables Customers (and their tax advisors) to assess and have confidence in how the Tungsten Network complies with these requirements and how Tungsten supports its Customers in meeting their legal obligations. However, it remains the ultimate responsibility of the Customer to “comply with the law.”

The Client also remains responsible by law for the Invoice content as well as for the accounting and reporting procedures. Tungsten can support the Client in the effectiveness of these procedures by implementing additional business rules to perform content validation during the processing of Supplier Invoices, as described below and in the Optional Functional Capabilities section of this document. These rules are agreed with the Client and built by the Tungsten Network.

For a current list of countries enabled for tax compliant invoicing and details on country-specific processing requirements affecting configuration of service delivery, please refer to the “Tungsten Network e-Invoice Compliant Countries” document.

#### 4.2.3. Commercial Invoice Transfer Service

For Invoices from Suppliers located outside of the Tungsten Network e-Invoice Compliant Countries, the Tungsten Network provides a Commercial Invoice Transfer Service which enables the electronic transfer of the commercial Invoice only. The legal tax Invoice is not created or processed by the Tungsten Network and Tungsten has no legal responsibility for it.

For those commercial Invoices, the regulatory component of the compliance check, as documented above in section 4.2.2, will not be applied and line level tax rates and amounts are not supported. The Invoice images produced by the Tungsten Network are for workflow purposes only and will include the words “not a tax invoice”.

It remains the responsibility of the Client and the Supplier to arrange for the transfer and archiving of the legal tax Invoice according to the relevant requirements of the source and destination countries and for taking any necessary tax advice to satisfy them that they can use the Commercial Invoice Transfer Service.

The PDF Image copy of Invoices submitted via the Commercial Invoice Transfer Service is supported in English language only.

#### 4.2.4. Client-specific compliance check

Tungsten creates an e-Invoicing Service profile for the Client that controls several aspects of The e-Invoicing and Invoice Status Service process flow for the Client, including Client-specific compliance check requirements. As documented in the optional services section below, the e-Invoicing and Invoice Status Service can perform a wide range of compliance checks. The Client e-Invoicing Service profile will designate if the Client wishes the Tungsten Network to validate one of the following core rules:

- If there is a reference to a purchase order, verify that the purchase order reference falls within an acceptable range or conforms to a specific syntax
- If the Invoice does not contain a reference to a purchase order, verify that the Supplier has identified a contact name or reference at the Client

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

If The e-Invoicing and Invoice Status Service identifies that the Invoice fails either one of the core Client-specific compliance checks, it will follow the Client's specific instructions to determine whether to accept the Invoice and deliver it to the Client with the error identified or whether to reject the Invoice and notify the Supplier that the Tungsten Network cannot accept the Invoice for delivery to the Client until the Invoice error is resolved. As noted above, additional Client rules can be implemented as documented in the Optional Functional Capabilities section of this document.

#### 4.2.5. Invoice compliance checking alerts

Regardless of the method for Invoice submission, Suppliers are notified if there are errors that result in one or more Invoices not being accepted for delivery to the Client.

Suppliers who submit files of data are notified via email alerts that document the results of the Invoice compliance check process; if the Supplier's file contains any errors, the Invoices with errors are identified and the errors explained. Suppliers who submit Invoices online are alerted to errors either online or via email notification.

Invoices that are accepted by the Tungsten Network are processed and delivered to the Client. As the Invoice is processed, its progression through to delivery to the Client is updated and is visible via the Tungsten Network Portal Invoice query or reporting services, as described below.

### 4.3. PDF Image creation and data archiving

At the successful completion of the compliance checking process, the Tungsten Network creates a PDF Image of the Invoice. The Tungsten Network digitally signs the PDF Image, providing the Client with assurance of the authenticity of the origin and the integrity of the Invoice data as required by law. As noted above, for Invoices from Suppliers located outside of the Tungsten Network e-Invoice Compliant Countries the PDF Image is annotated with "this is not a tax invoice."

The data along with the PDF Image and any associated Attachments are stored in the Tungsten Archive. The core e-Invoicing Service provides the Client with access to the Invoice data and PDF Image for a period of 90 days. Access for longer time periods are based on Client-specific requirements, as specified in the Optional Functional Capabilities section of this service specification.

### 4.4. Enhancement and augmentation

Prior to delivery to the Client, The e-Invoicing and Invoice Status Service can augment and enhance the Invoice data. There are several ways this can be done, including:

- Adding data that either the Supplier or the Client wants included on every Invoice
- Translating coded data fields to conform to the standards used by the Client's systems
- Adding data extracted from the Client's purchase order document that is referred to within the Invoice
- Adding data based on tables of data that the Client has provided to the Tungsten Network

The Client profile will contain the specifications for any enhancement and augmentation processing required by the Client.

## 4.5. Invoice data delivery

The e-Invoicing and Invoice Status Service delivers Invoice data to the Client on a Client-specific schedule and using the Client's preferred Tungsten Network Connectivity option. Prior to delivery, the e-Invoicing and Invoice Status Service transforms Invoice data from the Tungsten Network internal format and layout to the format, layout and syntax requirements of the Client. The delivery process, including the transformation requirements, is governed via specifications in an e-Invoicing Service profile that Tungsten develops for each Client entity that is setup to receive Invoice data from the Tungsten Network. The Client's profile may specify:

- The routing of Invoice data; the Tungsten Network can route all data to a single system or may be instructed to segregate data and route subsets of Invoices to different systems
- The format, layout, syntax and naming conventions for the data
- The method for delivery; the Tungsten Network can deliver data directly to the Client or the Client may choose to collect data manually via its OB10 Portal account. Refer to the "Tungsten Network Connectivity Options" document for a description of options available to the Client
- The frequency for delivery; if the Tungsten Network connects to the Client, it will do so based on a pre-agreed frequency or criteria such as Invoice volume
- The content included in the Invoice delivery; the Tungsten Network can deliver only the Invoice data or it can also deliver the PDF Images and any associated Attachments submitted by the Client's Suppliers

If the Invoice data is processed by multiple systems, the Client will define and document routing rules that are used by the Tungsten Network to deliver the data to the correct system.

## 4.6. Invoice Status Service

The invoice status service (ISS) component of the e-Invoicing and Invoice Status Service provides Suppliers with visibility of their Invoice throughout its life cycle; from the time it is submitted to the Client, to the conclusion of the Client's approval and payment processes.

**Service Capabilities:** The invoice status service component provides the Client with the following features:

- Uploading the current status of an Invoice as it moves through the Client's internal approval and payment processes
- Uploading supplemental information that clarifies or augments the Invoice status
- Online services for Invoice status queries and reporting via their Tungsten Network Portal account

The invoice status service component provides the Client's Suppliers with the following features:

- Online services for Invoice status queries and reports via their Tungsten Network Portal account
- Online services to activate the Invoice Status Service relationship with the Client

### 4.6.1. Invoice Status Upload

On a Client-determined periodic basis, the Client will transmit a file to the invoice status service component containing invoice status data. As discussed further in the implementation section, Tungsten will document the:

- Mandatory data fields that must be present for each Invoice status record. The mandatory data required will vary depending on whether the invoice was submitted via the Tungsten Network or via other methods. Refer to the Invoice Status Service Implementation Briefing for details on mandatory data fields
- Optional data fields that can be present based on the Client's preferences
- Validation logic that is invoked prior to accepting the Invoice status record for processing

Tungsten creates a profile on the Tungsten Network for each Client that is uploading Invoice status data. That profile specifies the format and layout that the Client will use to upload invoice status data. The Client uploads Invoice status data on the frequency of its choice. Upon receipt of the Client's Invoice status data, Tungsten will verify the integrity of the incoming record structure and transform the Invoice status data from the Client's format and layout to an internal format utilised by the invoice status service component and link it to the underlying Invoice record.

#### 4.6.2. Invoice Status Data Transformation

To provide consistency for Suppliers submitting Invoices to multiple Clients, a standard set of statuses are used by the invoice status service component to document the Client's processing status of a Supplier's Invoice, as follows:

- Received; indicating that the Client has acknowledged receipt of the Invoice and has initiated its approval review process
- Approved; indicating that the Client has approved the Invoice for payment
- Paid; indicating that the Client has paid the Invoice
- On Hold; indicating that the approval process is on hold pending the completion of a Client-specific task
- Exception; indicating that the Client has found one or more problems with the Invoice that need to be resolved prior to approving the Invoice for payment
- Rejected; indicating that the Client has rejected the Invoice for one or more reasons

The Client file may utilise their internal status categories. The invoice status service component will transform the Client's internal statuses to one of the five standard categories.

#### 4.6.3. Invoice Status Data

In addition to the overall status of an Invoice, the Client may upload additional supporting information. The additional information may include one or more of the following:

- Status Comment: a free text field containing up to 255 characters
- Payment Date: the date that the payment will be (or has been) made
- Remittance Advice: a reference to the remittance advice that was sent with the payment
- Optional Data: up to 20 additional free text fields that contain further information, each containing up to 255 characters.

#### 4.6.4. Enhancement and augmentation

Prior to publishing the Invoice status and providing visibility to the Supplier, the Invoice Status Service can augment and enhance the Invoice status data. There are several ways this can be done, including:

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.



- Adding standard information that the Client wants included; for example, a standard status comment that varies based on the Invoice status category
- Populating one or more optional data fields based on the Invoice status data; for example, the Client may upload a status of “price hold” and the Tungsten Network will categorise the Invoice status as “exception” and populate a free text optional field with “there is a problem with the unit price in the invoice”
- Translating coded field tags into plain language; for example, the invoice status record may contain a field tag; for example “EB” which is equivalent to the field description label of “Entered By”

The Client profile will contain the specifications for any enhancement and augmentation processing required by the Client.

## 4.7. Online services

All Customers have an Tungsten Network Portal account. Customers can use their OB10 Portal account to:

- Query an Invoice status
- Run ad-hoc reports on Invoices header data that include Invoice status information
- Access the Tungsten Archive to view the PDF copy of the Invoice and/or any related attachments
- Access online help and support
- Manage their Tungsten Network Portal account profile

The Client can also use the Tungsten Network Portal to:

- Manage selected Supplier relationship settings
- Collect Invoice data (if the Client has elected to manually retrieve Invoice data)
- Retrieve the PDF copy and/or any related attachments directly from the Portal without logging onto their Tungsten Network Portal account via an embedded URL contained within the Invoice record

Web Form Suppliers will have access to additional services, including:

- Online entry of Invoices using the Tungsten Network Invoice entry template
- Creation of customised online entry templates; Web Form Suppliers can create multiple partially completed Invoices that can be recalled and finalised prior to submission

The Web Form Supplier options for Invoice submission can also include a PO Convert method if the Client is utilising the Tungsten Network Purchase Order Service. Refer to the “Purchase Order Service Specification” document for a description of this OB10 Portal-based Invoice submission method.

## 5. Optional functional capabilities

The Client may elect one or more optional functional capabilities. The scope, parameters and any charges (if applicable) for an optional functional capability will be defined and delivered as outlined in a separate statement of requirements agreed between Tungsten and the Client.

### 5.1. Optional Client-specific compliance checks

The Client’s profile will contain any optional Client rules to be utilised during the compliance check process. Every data field is available for Client-specific compliance checking; including checking for the presence of

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

data or that the data:

- Falls within an acceptable range or conforms to the Client's syntax requirements
- Matches a value based on a table of data that the Client has provided to the Tungsten Network

The optional Client compliance check can also include a purchase order compliance component if the Client is utilising the Tungsten Network Purchase Order Service and has elected to implement that component of the Purchase Order Service. Refer to the "Purchase Order Service Specification" document for a description of this optional compliance checking capability.

If the Tungsten Network identifies that the Invoice fails one or more Client rules, it will follow the Client's specific instructions to determine whether to accept the Invoice and deliver it to the Client with the errors identified or whether to reject the Invoice and notify the Supplier that the Tungsten Network cannot accept the Invoice for delivery to the Client until the Invoice error is or errors are resolved.

## 5.2. Archiving

Access to the Invoice data and the PDF Image of the Invoice can be provided in accordance with the requirements of the Client. The core e-Invoicing Service provides the Client with access to the Invoice data and the PDF Image for 90 days. The optional archiving service can be utilised to provide access to the Invoice data and the PDF Image for a Client-specific period of time.

## 5.3. Digital Signature Verification

In some Tungsten Network e-Invoice Compliant Countries, there is a requirement to digitally sign the legal Invoice artifact (e.g., the PDF Image or the Invoice data file) to provide proof of authenticity of origin and integrity of data. There may also be a requirement to verify the digital signature on receipt or at a later stage. The verification report will need to be archived together with the electronic Invoice data. This is the responsibility of the Client but can be outsourced to Tungsten. The Tungsten Network can provide these verification reports for artifacts generated by the e-Invoicing and Invoice Status Service as part of the Client file delivery and/or store these in the Tungsten Network Archive.

Refer to the "Tungsten Network e-Invoice Compliant Countries" document for details about digital signature and signature verification requirements.

## 5.4. Extending the ISS for invoices submitted by Other Methods

The Client can extend the Invoice Status Service capabilities in the following ways:

- The Client can upload invoice status information for Suppliers who submit invoices to the Client via Other Methods than the Tungsten Network e-Invoicing Service
- Suppliers can utilise online services to register and activate the Invoice Status Service relationship with the Client. This capability is documented in the supplier onboarding section below

While the invoice status upload process and file format requirements will not change, the Client may wish to (or may need to) revise the contents of the file containing invoice status information to ensure that Suppliers who use Other Methods to submit invoices to the Client are able to utilise their Tungsten Network Portal account to fulfil their query and reporting requirements. Refer to the Invoice Status Service

Implementation Briefing for details on best practices related to providing the invoice status service for Suppliers who use Other Methods to submit invoices to the Client.

## 6. Core professional services

The following professional services are provided for the Client. The Client is only responsible for travel and expenses (e.g., T&E) in accordance with OB10's then current T&E policy; a copy of which is available on request.

### 6.1. Implementation services

Tungsten utilises a defined, structured methodology for implementing the Client. Tungsten will assign a program manager and a technical consultant to oversee the Client's implementation and be the Client's primary points of contact.

There are three main categories of tasks required during the implementation of the e-Invoicing and Invoice Status Service: Technical Setup and Services, Supplier Onboarding Preparation and Supplier Onboarding. The Client will have a lead role in some tasks, a collaborative role in some tasks and a supporting role in other tasks.

#### 6.1.1. Technical Setup

As part of an e-invoicing initiative, Tungsten will initiate a program and assign a Program Manager to oversee it. The program is separated into two distinct elements:

1. Technical Project.
2. Supplier Onboarding

A kick-off meeting is held between the Client and Tungsten to define the key dates, discuss responsibilities, agree on requirements and schedule activities within the program.

The key tasks for each element are detailed in the following tables.

Technical Project <sup>(1)</sup>	Activity	Led By	Client Resources
Pre-study	Present technical kick off	Tungsten	Minimal
	Define interfaces between Tungsten & Client		Significant
	Define Connectivity		Significant
	Define proposed technical architecture		Significant
	Plan project delivery and milestones		Minimal
Requirements & Design	Receive file definitions and sample data	Client	N/A
	Establish test cases and scenarios		
	Define and approve detailed design	Tungsten	None
Build	Submit design and receive first build	Tungsten	None
	Set up and approve connectivity		Variable
Testing	Host Client testing training session	Tungsten	Significant
	Integration testing (Tungsten staging)		Significant
	Client approves interfaces/connectivity		Minimal
	User acceptance testing		Significant
	Client approves acceptance testing		Minimal
Go-live and Hypercare Support	Note: Hypercare is a quality control measure implemented for an agreed period of time (usually 6 weeks) by the Tungsten technical team involved in the build stage of the technical project to ensure smooth handover to Tungsten support	Tungsten	Variable

Note (1) – To set up the Client’s access to the e-Invoicing and Invoice Status Service, Tungsten creates a dedicated profile for the Client on the Tungsten Network. During Invoice processing, that profile will be used to:

- Format the Invoice data so that it can be automatically imported into the Client’s systems for processing
- Augment and enhance the Invoice data to eliminate the need for manual intervention as much as possible
- Specify the delivery/collection preferences, method and frequency

A separate profile is required for each Tungsten Network Client account created within the Tungsten Network. If the Client is receiving Invoices for multiple tax entities, Tungsten will need to create multiple accounts for the Client and thus multiple profiles. The Client might also require multiple Tungsten Network accounts for operational reasons.

Note (2) - To set up the Client’s access to the Invoice Status Service, Tungsten creates a dedicated profile for the Client on the Tungsten Network. During the processing of invoice status information that profile will be used to:

- Format the invoice status data so that it can be automatically imported into the Tungsten Network database
- Augment and enhance the invoice status data if required
- Specify the delivery/collection preferences, method and frequency

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

Note (3) - One profile is provided as standard for the Client for both the e-Invoicing and Invoice Status Service and the Invoice Status Service. If the Client has multiple Tungsten Network accounts and other accounts can use the same profile, Tungsten will copy the profile prior to “go-live” for use by the other accounts. If a different connectivity option or a different file format is required, an additional profile will be required and charges would apply as stated below in Optional Professional Services section of this service specification.

Profile creation is an iterative process and changes are permitted as the Client goes through its user acceptance process. Following sign-off of the Client profile, further changes are subject to the Client making a formal support request as documented below and may be chargeable as stated below in Optional Professional Services section of this service specification.

Supplier Onboarding	Activity	Led By	Client Resources
Supplier Selection	Supplier database provided	Client	Variable
	Analyse which suppliers are known to Tungsten	Tungsten	None
	Analyse and identify supplier release groups	Tungsten	Minimal
	Procurement sign-off on final supplier list	Client	Variable
	Data cleanse – collect all required data	Client <sup>(1)</sup>	Variable
	Load suppliers into Tungsten Network database	Tungsten	Minimal
Internal Communications: Planning	Identify all functions requiring communications	Client	Variable
	Discuss communication options for functions	Tungsten	Minimal
	Prepare communication plan	Tungsten	Minimal
	Internal announcement of e-Invoicing initiative	Client	Variable
	Internal workshop	Tungsten	Significant
Internal Communications: Program Management	Hold kick-off meeting	Tungsten	Significant
	Setup Project Team	Client	Variable
	Identify internal stakeholders	Client	Variable
	Setup Steering Group	Client	Variable
	Hold pre-technical sign-off steering meeting	Client	Variable
	Hold pre-supplier release steering meeting	Client	Variable
	Distribute documentation to tax department	Tungsten	None
	Agree on reporting & escalation process	Tungsten	Minimal
	Agree on communications branding	Client	Variable
	Webpage draft content	Client	Variable
	Webpage signoff	Client	Variable
	Webpage translations	Client <sup>(1)</sup>	Variable
	Webpage creation – development site	Tungsten	None
	Tungsten-Network.com live client webpage	Tungsten	None
	OBi eMail Refer to Buyer alerts	Tungsten	None
	Setup weekly Refer to Buyer reporting	Tungsten	None
	Activate eMail alerts	Tungsten	None
	Review OBi reports	Client	Variable
	Agree on reports, distribution and frequency	Tungsten	Minimal
	Handover to onboarding team	Tungsten	Minimal
	Handover to implementation and support	Tungsten	Minimal
	Executive summary communication	Tungsten	None

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

Note (1) – The client may elect to delegate this task to OB10. See Optional services for details.

Supplier Onboarding	Activity	Led By	Client Resources
External Communications Preparation	Provide example supplier communications	Tungsten	None
	Draft communications (letter, FAQ, email, etc.)	Client	Variable
	Project team review of communications	Client	Variable
	Translate communication packs	Client <sup>(1)</sup>	Variable
	Check translations and approve	Client <sup>(1)</sup>	Variable
	Letter signed	Client	Variable
Refer to Buyer	Provide templates and response codes	Tungsten	None
	Discuss Refer to Buyer process	Tungsten	Significant
	Agree on Refer to Buyer process	Client	Variable

Note (1) – The client may elect to delegate this task to Tungsten. See Optional services for details.

Tungsten provides a number of specialists who work with the Program Manager to achieve these tasks. The Client is responsible for ensuring that appropriately skilled personnel on their side are available to ensure these tasks can be completed according to any agreed dates.

OB10 provides a number of specialists who work with the Program Manager to achieve these tasks. The Client is responsible for ensuring that appropriately skilled personnel on their side are available to ensure these tasks can be completed according to any agreed dates.

## 7. Customer service and technical support

Tungsten provides customer service and technical support for Customers via a number of channels, including the following:

- The Tungsten Network Portal provides on-line support in the form of documentation and videos
- The Tungsten Network Portal also enables Customers to register & submit support tickets on-line
- Customers can phone a regional Tungsten service center

Tungsten provides a multi-phase support program for Customers when their e-Invoicing Service transitions from the implementation stage to the ‘go-live’ stage. The support phases are:

- **Hypercare:** During the initial six to twelve weeks after go-live, the “Hypercare” service is provided for the Client. The Client’s Tungsten technical consultants pro-actively monitor the e-Invoicing and Invoice Status Service to ensure it is performing as designed. All support requests are referred to the Client’s program manager and lead technical consultant. The Hypercare phase continues until the e-Invoicing and Invoice Status Service is proven to be stable and any issues have been resolved.
- **Gold Support:** During the next three months, “Gold Support” is provided. This enables the Client to submit support requests to a specialised support team via email (buyer.goldsupport@tungsten-network.com) or by telephone during standard office hours:
- **Standard Support:** The Client raises support requests via the OB10 ticketing system or via a call to the Tungsten support center.

Standard support office hours are as follows:

- London hours: 08:00 – 18:00 GMT
- Atlanta hours: 08:00 – 19:00 EST

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

Gold support requests receive a service level of a response within four office hours (local time) during a Working Day.

Following the six month post go-live period, the Client reverts to the standard Client support service with requests submitted via the Tungsten Network Portal ticketing process or via telephone to an Tungsten support center.

### 7.1.1. Support Escalation Process

Tungsten classifies support requests based on severity as follows

- Severity 1: All clients cannot receive data from the Tungsten Network and/or cannot send data to the Tungsten Network
- Severity 2: The Client cannot receive data from the Tungsten Network (all suppliers linked to this Client are affected) and/or cannot send data to the Tungsten Network
- Severity 3: The Client cannot receive data from the Tungsten Network for a single Supplier and/or cannot send data to a single Supplier
- Severity 4: General support requests such as change to Supplier numbers, basic change to profile, etc.

Logging a support request: All support requests must be submitted by the Client via the Tungsten Network Portal at [www.tungsten-network.com/support](http://www.tungsten-network.com/support). Response and updates targets are as follows:

- Severity 1 & 2
  - Initial response to Customer within 4 office hours
  - Update provided every 4 office hours
- Severity 3
  - Initial response to Customer within 1 Working Day
  - Update provided at a minimum daily (for a Working Days) or as agreed
- Severity 4
  - Initial response to Customer within 2 Working Days
  - Update provided via the Tungsten Network Portal; notification via email

For Severity 1 and 2: Tungsten will support the Client raising escalation emails to our Gold Support and copied to the Tungsten program/account manager(s). Tungsten will also accept escalation support calls to the Tungsten account manager(s). In all cases the ticket number must be quoted.

For Severity 3: Tungsten will support the Client raising escalation emails to our Gold Support and copied to the Tungsten account manager(s) if Tungsten has not responded within 1 Working Day. Tungsten will also accept escalation support calls to the Tungsten account manager(s). In all cases the ticket number must be quoted.

When an issued that is classified as either Severity 1 or 2 occurs, Tungsten will advise the Client directly via phone and/or email. This should take no longer than 4 office hours from the time the event was discovered.



## 8. Optional professional services

The following services are provided optionally based on the specific needs of the Client. The Client may be responsible for time and materials charges based on the statement of requirements agreed between Tungsten and the Client.

The Client will be responsible for travel and expenses (e.g., T&E) in accordance with Tungsten's then current T&E policy a copy of which is available on request.

### 8.1. Time and materials assistance

At any time during the contracted period, the Client can request assistance from Tungsten. If the request is outside of what could reasonably be expected under normal operation of the e-Invoicing and Invoice Status Service, additional charges may be applicable. Prior to commencing any such work, Tungsten will notify the Client that the request falls under the Time and Materials Assistance service and will provide an estimate of the costs including any associated travel and accommodation related expenses. Examples of such work are:

- Profile changes taking more than half of one man day following profile sign-off by the Client
- Additional profiles
- Restoration of available data files successfully delivered to the Client by Tungsten (where the Client has lost or corrupted the files within its environment)
- Import of client-specific data for use in compliance checking, enhancement or augmentation

### 8.2. Client profiles

Additional Client profiles or Client profile changes following Client sign-off on a Client profile provided within the Core Professional Service component of The e-Invoicing and Invoice Status Service are subject to the Client making a formal support request.

Requirements for additional Client profiles (pre or post go-live) and/or for changes to Client profile(s) (post go-live) will be carried out under "Time and Materials Assistance" as detailed above and an estimate will be submitted to the Client for approval prior to the work commencing.

### 8.3. Custom Web Form

The Invoice entry template used by Web Form Suppliers to enter Invoice data can be adapted to reflect Client-specific requirements. The following options are available:

- Display the Client's logo
- Customise the fields displayed to the Supplier (for example, non-relevant fields can be removed or new fields added)
- Change to field descriptions to use Client-specific wording
- Help text specific to the Client

### 8.4. Custom connectivity

The Client can request the use of a custom connectivity option. When requesting this, the Client must provide detailed information to Tungsten for assessing the custom connection. There is no compulsion on

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

the part of Tungsten to agree to the requested custom option. Refer to the “Tungsten Network Connectivity Options” document for a description of standard options available to the Client

## 8.5. Data export

In addition to the standard data delivery service provided as a core functional capability, the Client may optionally request that Tungsten deliver one or more files of data extracted from the Tungsten Archive on a client-specific frequency and medium.

## 8.6. Subscription reports

In addition to the alert reports and the online ad-hoc reporting services provided via the Tungsten Network Portal, the Client may optionally request the creation of custom reports. These reports, referred to as Subscription Reports, can be provided to the Client on the frequency of their choice and delivered via email.

## 8.7. Supplier data cleansing

The data cleansing service obtains primary contact data at each Supplier organisation for two primary contacts, typically the Sales Manager and the Head of Accounting.

On completion of the process, the results are shared with the Client so that the Client's Supplier master data files can be updated. If it is not possible to obtain suitable contact data for a Supplier, the Supplier cannot be included in the Supplier onboarding campaign.

## 8.8. Communications translations

Tungsten will at the Client's request arrange for translation of Supplier communication packs into the agreed Tungsten supported languages.

## 8.9. Postal mailing

Tungsten can create, collate and distribute printed collateral to targeted Suppliers on behalf of the Client via postal mail delivery.

## 9. References

Please refer to the following documents for additional information:

- Tungsten Network e-Invoice Compliant Countries
- Tungsten Network Connectivity Options
- Tungsten Network Invoice Status Service Implementation Briefing
- Tungsten Network Purchase Order Service Specification

# Tungsten Network Purchase Order Service

## *Service Specification*

Version: 20140929 - TN US

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

## 1. Document usage

This document describes the functional scope of the Tungsten Network Purchase Order Service and the Professional and Technical Services provided by Tungsten Network in support of the service.

## 2. Definition of terms

Term	Definition
“Customers”	Refers to organisations that either send or receive data via the TN Network
“Supplier”	Refers to an organisation that has received purchase orders from or submitted invoices to the Client
“Working Day”	Means Monday to Friday, excluding US Federal holidays and the day after Thanksgiving (for Atlanta) and days when banks in London are closed for business (for London)

Capitalised terms used and not defined in this document have the meanings assigned to them in the MSA or the accompanying SOW. References throughout this document to the “Client” include references to its Authorised Affiliates (as applicable). References to MSA and SOW refer to the accompanying agreement and (if applicable) statement of work in place between Tungsten Network and the Client in relation to the provision of this service.

## 3. Tungsten Network Purchase Order Service overview

The Purchase Order Service is comprised of a defined set of functional capabilities that may or may not be enabled based on the specific requirements of the Client. The Purchase Order Service enables a Client to upload purchase orders to the Purchase Order Service in order to utilise the following set of capabilities:

- Distribute purchase orders to Suppliers for order fulfilment (Purchase Order Distribution)
- Make purchase orders available to Suppliers to convert into an invoice on the Tungsten Network Portal (PO Convert)
- Utilise purchase order data as a validation point during invoice processing (Purchase Order Compliance)

After uploading purchase orders to the Purchase Order Service, the Client may enable any combination of the functional capabilities as illustrated by the following table.

Functional Capabilities	Header	Detail/Line
Purchase Order Compliance only	X	X
PO Convert only		X
Purchase Order Compliance and PO Convert		X
Purchase Order Distribution and PO Convert		X
Purchase Order Compliance, Purchase Order Distribution and PO Convert		X

**Pre-requisites:** The implementation of the Tungsten Network e-Invoicing Service is a pre-requisite for the implementation of the Purchase Order Service.

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

## 4. Core purchase order functional capabilities

### 4.1. Purchase order upload

On a Client-determined periodic basis, the Client will transmit a file containing purchase order data to the Purchase Order Service. As discussed further in the implementation section, Tungsten Network will document the:

- Valid types of purchase order records that can be uploaded
- Mandatory data fields that must be present in each purchase order record
- Optional data fields that may be included in each purchase order record
- Validation logic that is invoked prior to accepting the purchase order record for processing

Tungsten Network creates a Purchase Order Service profile for each Client business entity that is uploading purchase order data. That profile specifies the format and layout that the Client will use to upload purchase order data. Upon receipt of the Client's purchase order data, the Purchase Order Service invokes a process that will verify the integrity of the incoming record structure and transform the purchase order data from the Client's format and layout to an internal format utilised by the Purchase Order Service to process the purchase order data.

#### 4.1.1.Types of purchase order records

The Client can upload the following:

- New purchase orders
- Change orders; a complete replacement of the current version of the purchase order

The Client can issue change orders for multiple purposes:

- Revising the terms and conditions; for example, different goods or services, updated quantities, updated pricing, different delivery timeframe, etc.
- Updating the purchase order used for compliance checking purposes following receipt of an invoice; for example, to reduce the available amounts for subsequent invoices
- Cancelling or closing the purchase order

#### 4.1.2.Enhancement and augmentation

Prior to storing the new or changed purchase order and providing visibility to the Supplier, the Purchase Order Service can augment and enhance the purchase order data. There are several ways this can be done, including

- Adding standard information that the Client wants included; for example, standard terms and conditions that apply to every purchase order

The Client profile will contain the specifications for any enhancement and augmentation processing required by the Client.

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

## 4.2. Online purchase order capabilities

All Customers have an online Tungsten Network Portal account. When the Client uploads purchase order data, the purchase order data is stored in the Tungsten Network database. The purchase order data is visible to the Client via a number of Tungsten Network Portal functions, including:

- Purchase Order Management:
  - Review the purchase orders that the Client has sent
- Run ad-hoc reports on purchase orders sent

If the Client has elected to enable the purchase order distribution service or has enabled the Suppliers to utilise the PO Convert function, the Suppliers will also have access to a similar set of functional capabilities via their Tungsten Network Portal account. Additionally, if the Client has enabled the Suppliers to use PO Convert, the Suppliers may access the PO Convert capability to:

- Systematically populate the Supplier's online Tungsten Network Web Form invoice with data from the Client's purchase order, as described in 4.2.1 below

### 4.2.1. PO Convert

If the Client elects to enable this function, the Supplier will have visibility to the purchase orders via the Tungsten Network Portal Purchase Order Management functionality. The Supplier may display a purchase order and invoke the PO Convert function in order to select the lines of purchase order data that are to be included in an invoice to the Client. When the lines are selected and the Supplier invokes the "create invoice" function via its Tungsten Network Web Form account, the PO Convert service will populate the Supplier's online invoice with:

- Client name and ship to information
- Supplier name and ship from information
- The Client's purchase order number
- The purchase order currency
- The data from the designated purchase order lines; including a reference to the purchase order line number

The Supplier can then add any additional information or data as required before submitting the invoice to the Client.

## 4.3. Purchase order distribution

If the Client elects to enable this function, the Supplier will have visibility to the purchase orders via the Tungsten Network Portal Purchase Order Management functionality. If the Supplier wishes to be notified via email that the Client has sent them a new or change order, they can specify one or more recipients to receive purchase order alerts.

Optionally, the Supplier can elect to receive purchase orders via file transfer via one of two delivery options. They may either manually download a file of purchase orders or the Purchase Order Service can automatically connect to the Supplier and deliver the file of new or changed purchase orders to them using their preferred data transfer mechanism and in the structured format of their choice.

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

Web Form Suppliers can access their purchase orders online as described in section 4.2 above and can organise their purchase orders by status (e.g. pending, accepted, rejected, archived). Regardless of the status, Suppliers can display or print the purchase order.

## 5. Optional purchase order services

The Client may elect one or more of the following optional functional capabilities. The scope and parameters for any optional functional capabilities will be defined, delivered and charged for on the basis outlined in a separate statement of requirements agreed between Tungsten Network and the Client.

### 5.1. Purchase order compliance

The Purchase Order Service can check that PO-based invoices submitted by the Client's Suppliers comply with the terms and specifications of the Client's underlying purchase order.

The Client can designate that the Purchase Order Service perform the following types of compliance checking on a Supplier-by-Supplier basis:

- No purchase order compliance checking
- Header level compliance (e.g. is the purchase order open and was it issued to this specific Supplier)
- Detail/Line level purchase order compliance checking

If Line level purchase order compliance checking applies, the Purchase Order Service will first determine if the lines of the invoice contain a reference to a line in the underlying purchase order. If not, the Purchase Order Service will attempt to determine the correct purchase order line for each invoice line. There are multiple methods that can be used to align a purchase order line with the correct corresponding invoice line, including the following:

- Product numbers
- Product descriptions (fuzzy logic)
- Quantity
- Unit of Measurement
- Unit Price

When the Purchase Order Service has aligned the purchase order lines with the invoice lines, it then performs a compliance check at the line level; for example does the invoice reference the correct:

- Product or service? (e.g. using the product number or description)
- Quantity? (exact or within a tolerance set by the Client)
- Unit of measurement?
- Unit price? (exact or within a tolerance set by the Client)

Additionally, the Purchase Order Service can ensure that the Supplier has included all of the appropriate information contained in the underlying purchase order in their invoice. If not, the Purchase Order Service can augment the Supplier's invoice data with data from the underlying purchase order. For example:

- GL codes
- Tax codes

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.



- Alternate descriptions
- Contact names and/or emails

Finally, the Client can determine the action that the Purchase Order Service will take if the invoice fails one or more of the purchase order compliance checks. Each rule can state if the Purchase Order Service should or should not accept the invoice for delivery to the Client. For example, if a rule specifies that a failure should prevent the Supplier from submitting the invoice, the Tungsten Network e-Invoicing Service will not accept the invoice for delivery to the Client and it will notify the Supplier that they must resolve this error and re-submit the invoice. Alternatively, a rule may specify that the Tungsten Network e-Invoicing Service will accept the invoice for delivery to the Client but that the invoice is flagged so that the Client can immediately route it for the appropriate exception processing.

## 6. Professional services

The Purchase Order Service provides a set of professional services from one or both of the following categories:

- Core professional services
- Optional professional services that may be provided based on the specific requirements of an individual Client

### 6.1. Core professional services

Tungsten Network will assign a dedicated Program Manager to oversee the Client's implementation. The Program Manager will be the Client's primary point of contact and will be responsible for co-ordinating the supporting Tungsten Network resources needed to successfully complete the Client's implementation.

#### 6.1.1. Technical setup

During the Technical Setup phase Tungsten Network will:

- Document the mandatory data elements that must be included in each purchase order record
- Document the pre-processing logic used to check the purchase order data prior to accepting it for processing

During the Technical Setup phase the Client will:

- Specify the purchase order data format used by its internal systems to generate a file for export to the Purchase Order Service
- Specify how the purchase order data is to be delivered to the Purchase Order Service
- Configure its system or systems to generate and export the purchase order data
- Specify any augmentation and enhancements required during processing by the Purchase Order Service

More details on Tungsten Network professional and technical services are discussed in the following sections.

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

### 6.1.2. Technical services

To enable the Client to upload purchase order data, Tungsten Network creates a dedicated profile for the Client on the Purchase Order Service. During purchase order data processing, that profile will be used to:

- Transform the purchase order data from the Client's format and layout to the internal Tungsten Network format and layout
- Augment and enhance the purchase order data if required by the Client
- Specify the upload connection method and frequency

A separate profile is required for each Tungsten Network Client account that will upload purchase order data to the TN Network. Based on the Client-specific operating requirements, Tungsten Network may need to create multiple accounts for the Client and thus multiple profiles.

One profile is provided as standard. If the Client has multiple Tungsten Network accounts and other accounts can use the same profile, Tungsten Network will copy the profile prior to "go-live" for use by the other accounts. If a different connectivity option or a different file format is required, an additional profile will be required and charges would apply as stated below in the Optional Professional Services section of this service specification.

Profile creation is an iterative process and changes are permitted as the Client goes through its user acceptance process. Following sign-off of the Client profile, further changes are subject to the Client making a formal support request as documented below and may be chargeable as stated below in the Optional Professional Services section of this service specification.

### 6.1.3. Customer service and technical support

Tungsten provides customer service and technical support for Customers as defined in the Tungsten Network e-Invoicing Service Specification.

## 6.2. Optional professional services

The following services are provided optionally based on the specific needs of the Client. The Client may be responsible for time and materials charges based on the statement of requirements agreed between Tungsten Network and the Client.

The Client will be responsible for travel and expenses (e.g., T&E) incurred in accordance with Tungsten Network's then current T&E policy a copy of which is available on request.

### 6.2.1. Time and materials assistance

At any time during the contracted period, the Client can request assistance from Tungsten Network. If the request is outside of what could reasonably be expected under normal operation of the Purchase Order Service, additional charges may be applicable. Prior to commencing any such work, Tungsten Network will notify the Client that the request falls under the Time and Materials Assistance service and will provide an estimate of the costs including any associated travel and accommodation related expenses. Examples of such work are:

- Profile changes taking more than half of one man day following profile sign-off by the Client
- Additional profiles

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

- Reprocessing of data files sent by the Client to the Purchase Order Service that were successfully processed by the Purchase Order Service
- Re-synchronisation of purchase order data due to the Client's data omission.
- Backload of Historic Purchase Order (as described in section 6.3.4 below)

#### 6.2.2. Client profiles

Additional Client profiles or Client profile changes following Client sign-off on a Client profile provided within the Core Professional Service component of the Purchase Order Service are subject to the Client making a formal support request.

Requirements for additional Client profiles (pre or post go-live) and/or for changes to Client profile(s) (post go-live) will be carried out under "Time and Materials Assistance" as detailed above and an estimate will be submitted to the Client for approval prior to the work commencing.

#### 6.2.3. Custom connectivity

The Client can request the use of a custom connectivity option. When requesting this, the Client must provide detailed information to Tungsten Network for assessment, although there is no compulsion on the part of Tungsten Network to agree to the requested custom option. Refer to the "Tungsten Network Connectivity Options" document for a description of the standard options available to Client.

#### 6.2.4. Purchase Order Backload

The Client can request Tungsten Network to backload purchase orders into the Tungsten Network database that were issued by the Client prior to the date of implementation of the Purchase Order Service ("Historic Purchase Orders") as part of service implementation. This enables purchase orders received by Suppliers prior to the use of this service for that Supplier to be available for the purposes of the Purchase Order Compliance checks and/or PO Convert.

A backload of purchase orders that are sent to the Purchase Order Service by the Client will be treated as new purchase orders for the purposes of processing, with the Client being able to choose if they want Suppliers to be notified of the purchase orders being available within the TN Network as part of the load process.

One simultaneous backload of Historic Purchase Orders will be provided without an additional "Time and Materials Assistance" charge. Additional backloads, if required, will be carried out under the "Time and Materials Assistance" as detailed above and an estimate will be submitted to the Client for approval prior to the work commencing.

If the Client chooses not to use this service, it should be noted that the first time a purchase order is sent to the Purchase Order Service as part of normal processing, it must be a purchase order "New" message as the purchase order will not pre-exist in the Tungsten Network database.

## 7. References

Please refer to the following documents for additional information:

- Tungsten Network Connectivity Options
- Tungsten Network e-Invoicing Service

NOTICE: The information within this document is confidential and proprietary to Tungsten Network and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten Network.

# Tungsten Network Analytics

## Specification and User Guide

Version	20141022 - 6
Date	October 2014

# Table of Contents

1. Introduction .....	3
2. Definition of terms.....	3
3. Tungsten Network Analytics Service Overview .....	4
4. Data Processing.....	4
5. Company setup .....	4
5.1 User set up .....	4
6. Accessing the Service .....	5
7. Home Dashboard .....	6
8. Reporting Currency .....	7
8.1. Exchange Rates .....	7
9. Making Selections .....	8
9.1. Searching for suppliers or products.....	9
9.2. Clearing selections .....	10
9.3. Saving reports .....	10
9.4. Downloading Data .....	11
9.5. Sorting data.....	11
10. Reports.....	13
10.1. Account Price Variance Reports and Group Price Variance Reports .....	13
10.1.1. Account Price Variance – Variance Filtered.....	13
10.1.2. Looking at price variances by supplier .....	14
10.1.3. Looking at price variances by product .....	15
10.1.4. Looking at original invoices.....	19
10.2. Looking at daily and weekly price variances.....	19
11. Invoice Analysis .....	21
11.1. Spend Summary .....	21
11.2. Invoices by supplier report .....	23
11.3. Products by supplier report .....	24
12. FAQs .....	26
13. Known Issues.....	28
13.1. Apple Computers .....	28

## 1. Introduction

This document describes how the Tungsten Network Analytics Service ('the Service') works as well as the key features and functionality.

## 2. Definition of terms

Term	Definition
Working Day	Means Monday to Friday, excluding US Federal holidays and the day after Thanksgiving (for Atlanta) and days when banks in London are closed for

	business (for London)
Service Capability	Means the Service Capability selected by Client. Details of Service Capabilities are maintained in the Tungsten Network Analytics Portal.
User	A User is an employee of Client that uses the Service
Administrator	The Clients Administrator who is responsible for adding and deleting Users

### 3. Tungsten Network Analytics Service Overview

The Tungsten Network Analytics Service is a reporting and spend analysis tool.

The Service is delivered as a cloud solution and is accessible via a modern web browser.

The Service enables you to analyse invoice and purchase order data:

- to view supplier spend activity
- to identify potential savings from price variances
- to create a variety of spend reports. Spend and other reports will be enhanced from time to time

The user interface is in English Language

### 4. Data Processing

Tungsten will extract your invoice and purchase order data from the Tungsten data warehouse. The extracted data is held in a secure environment in where it is processed and made available to you over a web interface.

The data is extracted every hour and the reporting interface is refreshed every 24 hours.

Historical data is available for 3 years. Data is removed from the Service after 3 years.

### 5. Company setup

Tungsten will set up the Service and Users according your requirements.

Set up will take 48 hours during working days.

#### 5.1 User set up

Users are set up for the Service by Tungsten staff.

In order to set up a new User, your Client Administrator emails Tungsten with the name and email address of the proposed User, along with access rights. Tungsten will set up new Users within 48 hours of the request during working days.

## 6. Accessing the Service

You access the service via the Tungsten Network Analytics Portal, which is accessible via any modern web browser on a personal computer or tablet device.


On accessing the Portal you will be presented with the Access Point which will display one or more datapacks depending on your set up and configuration.

Welcome Stefan F. | Favorites & Profile


**TUNGSTEN NETWORK ANALYTICS** Last updated 18 March 2014 13:01:11 GMT

AccessPoint Showing 1-5 of 5 1 12 items per page


Category: All Attribute: No Attributes Available View as: Grid Search Here Go




★ Spend Analytics - Client 1.qvw  
Last Update: 2014-03-18 11:59  
Next Update: 2014-03-19 07:00  
[view details](#)




★ Spend Analytics - Client 2.qvw  
Last Update: 2014-03-18 11:59  
Next Update: 2014-03-19 07:00  
[view details](#)



★ Spend Analytics - Client 3.qvw  
Last Update: 2014-03-18 11:59  
Next Update: 2014-03-19 07:00  
[view details](#)



★ Spend Analytics - DEMO.qvw  
Last Update: 2014-03-18 11:59  
Next Update: 2014-03-19 07:00  
[view details](#)



★ Spend Analytics - No BuyerGroup.qvw  
Last Update: 2014-03-18 11:59  
Next Update: 2014-03-19 07:00  
[view details](#)

Showing 1-5 of 5 1 12 items per page

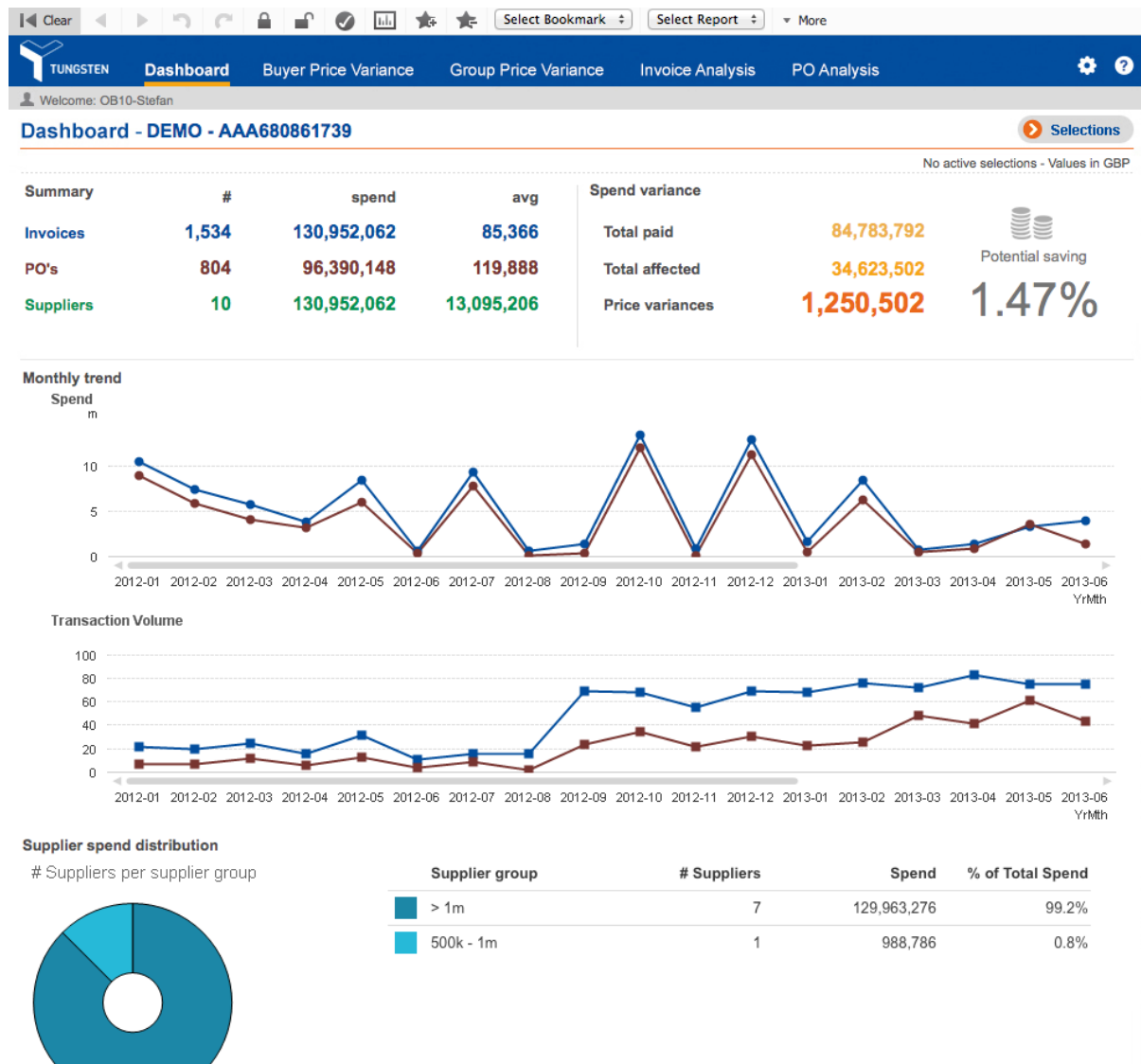
Selecting a datapack will launch the Service and you will be taken to the home dashboard.

Datapacks are updated every 24 hours.



## 7. Home Dashboard

The home dashboard provides you with an overview of your spending activity. The default period shown is 3 years but you can change the dashboard reporting period. See 'making selections'.



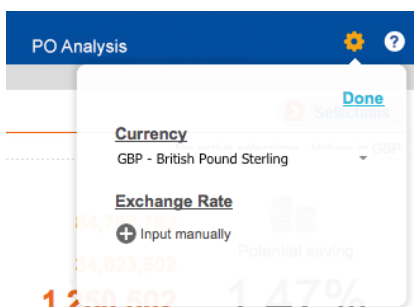
## 8. Reporting Currency

All reports are displayed in your base currency. The base currency is either US Dollar, Euro or Pound Sterling.

You can change your base currency by clicking on the gear at the top right of the screen



You will be presented with a selection dialog where you can select the appropriate currency. This setting is retained for all future reports and reporting sessions.



### 8.1. Exchange Rates

Default exchange rates are taken from the European Central Bank on the first day of each month. These rates will be used for all reports created during that month.

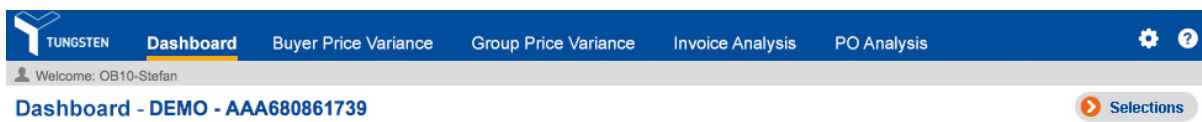
If you wish to use your own exchange rates you can upload your exchange rates to the Portal by uploading an excel or csv formatted file. More information on how to do this is available from Tungsten.

## 9. Making Selections

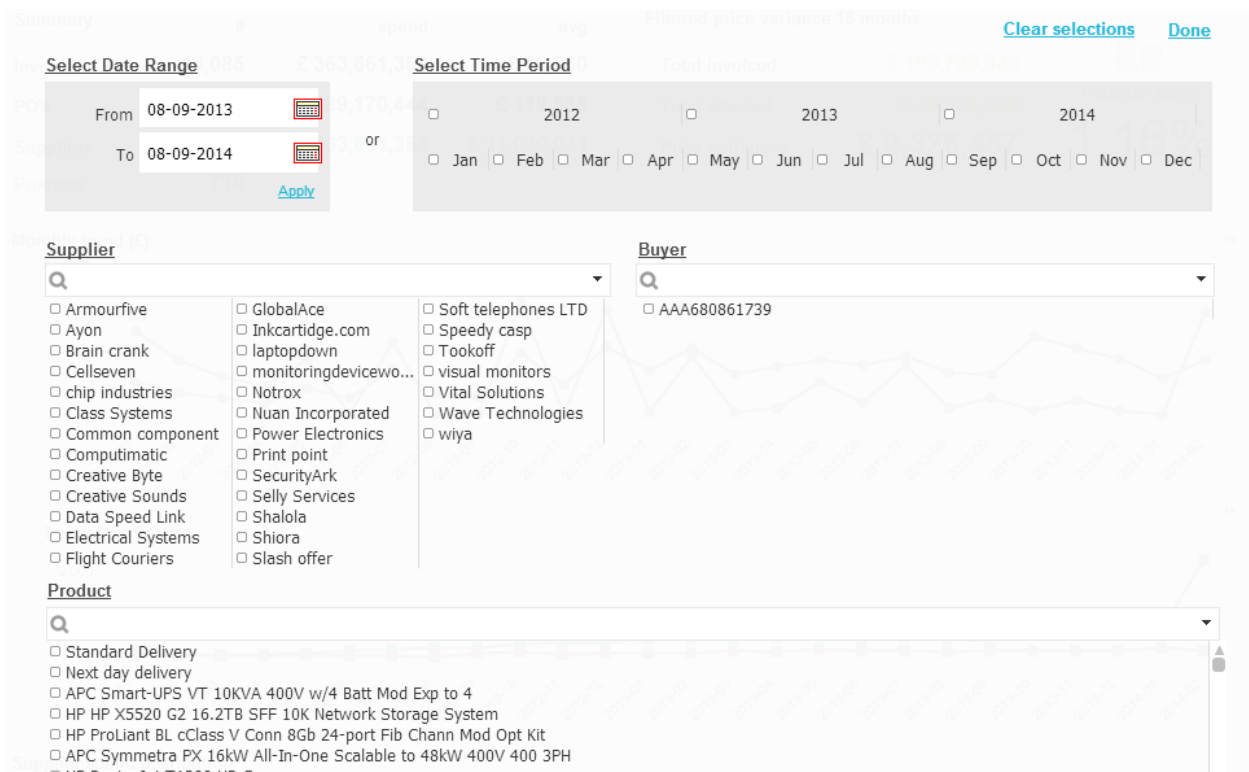
Within any of the reporting screens, you are able to make a variety of selections, which include

- Changing the buyer (if you have more than one buyer account)
- Changing the reporting date period (NOTE price variance reporting displays 18 months worth of data)
- Changing the supplier (default is all)
- Changing the reporting period
- Search for and select a supplier or group of suppliers
- Search for and select a product or group of products

The selections dialog box is accessed by clicking on the 'Selections' button.



You will then be presented with the selections dialog box.



The screenshot shows the 'Selections' dialog box. It includes a 'Select Date Range' section with 'From' and 'To' date pickers set to 08-09-2013 and 08-09-2014 respectively, and an 'Apply' button. A 'Select Time Period' section shows years 2012, 2013, and 2014, with a monthly selection grid below. The 'Supplier' section features a search bar and a list of suppliers, including Armourfive, Ayon, Brain crank, Cellseven, chip industries, Class Systems, Common component, Computimatic, Creative Byte, Creative Sounds, Data Speed Link, Electrical Systems, Flight Couriers, GlobalAce, Inkartidge.com, laptopdown, monitoringdevicewo..., Notrox, Nuan Incorporated, Power Electronics, Print point, SecurityArk, Selly Services, Shalola, Shiora, and Slash offer. The 'Buyer' section has a search bar and a dropdown menu showing 'AAA680861739'. The 'Product' section has a search bar and a list of products, including Standard Delivery, Next day delivery, APC Smart-UPS VT 10KVA 400V w/4 Batt Mod Exp to 4, HP HP X5520 G2 16.2TB SFF 10K Network Storage System, HP ProLiant BL cClass V Conn 8Gb 24-port Fib Chann Mod Opt Kit, APC Symmetra PX 16kW All-In-One Scalable to 48kW 400V 400 3PH, and HP DesignJet T1300 HP DesignJet.

As you make selections, they will be highlighted in green.

You will also note that where data is available then the nearby box is left blank, where data is *not* available the nearby box is greyed out.

Summary 422 £14,581,222 avg Filtered price variance 18 months [Clear selections](#) [Done](#)

Select Date Range 422 £14,581,222 1,441,981 or 4,431,222 Apply

From 08-09-2013 To 08-09-2014

Select Time Period 2012 2013 2014

☒ Jan ☐ Feb ☐ Mar ☐ Apr ☐ May ☐ Jun ☐ Jul ☐ Aug ☐ Sep ☐ Oct ☐ Nov ☐ Dec

Supplier (1) Buyer

Search

☐ Armourfive ☐ Shalola ☐ Print point ☐ Selly Services ☐ Soft telephones LTD ☐ Speedy casp ☐ Tookoff ☐ visual monitors ☐ Vital Solutions

☐ Ayon ☐ Shiora ☐ Slash offer ☐ Wave Technologies ☐ wiya ☐ chip industries ☐ Class Systems ☐ Creative Byte ☐ Creative Sounds ☐ Data Speed Link ☐ Flight Couriers ☐ Inkcartidge.com ☐ laptopdown

☐ Brain crank ☐ Common component ☐ Computimatic ☐ Electrical Systems ☐ GlobalAce ☐ monitoringdevicewo... ☐ Notrox ☐ Nuan Incorporated ☐ Power Electronics ☐ SecurityArk

Product

Search

☐ Dell R72078\*3.5" XHC E5-2620 16GB (2x8GB) 300GB?H710 RAID 3Yr NBD ☐ Qsan Technology Qsan U600Q-S424 24 Bay 4u 10Gb NAS/ISCSI ☐ Dell Precision T3610 Intel Xeon E5-1620 16GB 1TB W7P w/Mse Kybrd ☐ QNAP TS-EC1679U-RP 32TB 16 Bay Ultrastar ☐ Panasonic Toughpad FZ-G1 MK1 Windows 8 ☐ Eaton Eaton PW9140 3U EBM ☐ HP BL460C GEN8 Intel Xeon E5-2650V2 1P 32GB ☐ IBM x3690 X5 2.13GHz E7-2830 24MB 2x4GB Open Bay ☐ Apple Mac Pro Intel Xeon E5 16GB 256GB OS X Mavericks 10.9

Supplier Group (1) # Suppliers Spend (£) % of Total Spend

TIP : To make multiple selections, press ctrl and click the selection (Mac: ctrl and click the selection).

## 9.1. Searching for suppliers or products

You can narrow your search criteria to specific suppliers or products within the selections dialog box by typing your search criteria, if there are matching records, they are returned (highlighted yellow)

Supplier (1) Product

Search  ×

☒ Supplier Name: (1) ☐ LineDescription: (2)

☒ Computimatic ☐ HP V Conn ☐ Server

☐ Brain crank ☐ Slash offer ☐ Soft telephones LTD ☐ Speedy casp ☐ Tookoff ☐ visual monitors ☐ Vital Solutions

☐ Cellseven ☐ Wave Technologies ☐ wiya ☐ chip industries ☐ Class Systems ☐ Creative Byte ☐ Creative Sounds ☐ Data Speed Link ☐ Flight Couriers ☐ Inkcartidge.com ☐ laptopdown

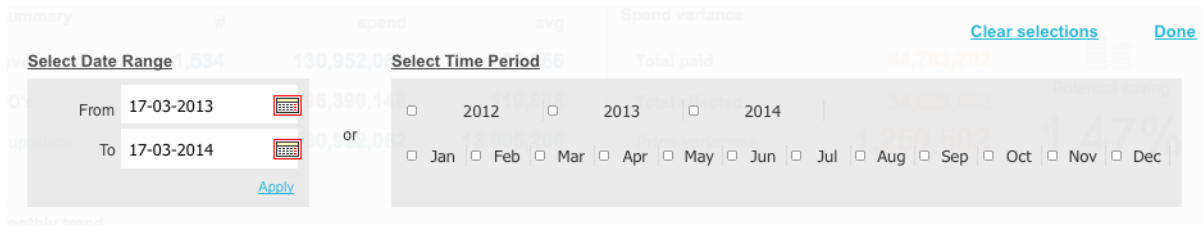
☐ Common component ☐ Computimatic ☐ Electrical Systems ☐ GlobalAce ☐ monitoringdevicewo... ☐ Notrox ☐ Nuan Incorporated ☐ Power Electronics ☐ SecurityArk

☐ QNAP TS-EC1679U-RP 32TB 16 Bay Ultrastar ☐ Panasonic Toughpad FZ-G1 MK1 Windows 8 ☐ Eaton Eaton PW9140 3U EBM ☐ HP BL460C GEN8 Intel Xeon E5-2650V2 1P 32GB ☐ IBM x3690 X5 2.13GHz E7-2830 24MB 2x4GB Open Bay ☐ Apple Mac Pro Intel Xeon E5 16GB 256GB OS X Mavericks 10.9 ☐ NEC SpectraView Reference 271 LCD Monitor ☐ Eaton 9140 7.5KVA Powerware RoHS Compliant UPS ☐ LG Electronics 47" LED Widescreen Full HD Capable Monitor Black ☐ Samsung Series 6 Slim LED Full HD 3D 60"

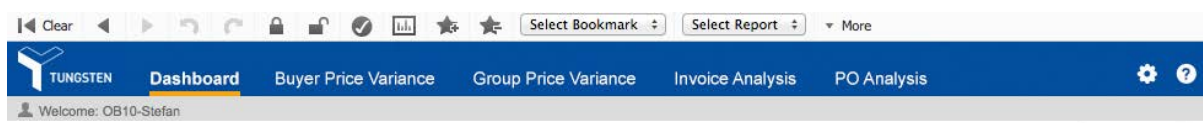
Supplier Group (1) # Suppliers Spend (£) % of Total Spend

## 9.2. Clearing selections

At any time you can clear all selections from either the 'clear selections' button in the selections dialog box

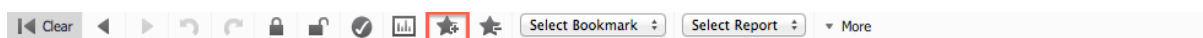


Selections can also be cleared by clicking on the 'Clear' button at the top left hand corner of each screen



## 9.3. Saving reports

At any time you can save your report selections by adding a bookmark, clicking on the add bookmark button will present you with options for saving your report.



## 9.4. Downloading Data

Many of the reports allow you to download the data to an excel spreadsheet. Where this functionality is available for a report you will see the small icon

### Supplier spend details

Supplier Name	# Invoices	# POs	Invoice Spend /	PO Spend
<b>Total</b>	<b>1,534</b>	<b>804</b>	<b>130,952,062</b>	<b>96,390,148</b>
Speedy casp	54	74	51,902,305	57,523,545
Tookoff	62	43	50,118,935	26,456,395
SecurityArk	145	40	17,589,197	5,246,058
Electrical Systems	59	0	4,582,807	0
Wave Technologies	334	0	3,693,256	0
Shiora	205	219	1,049,219	1,066,405
Power Electronics	340	0	1,027,558	0
Class Systems	335	0	988,786	0



Clicking on the icon will download the report.

Depending on your set up you may see this dialog box

### Excel Export



The requested content has been opened in another window.

If you know that this is not the case, [press here](#)

OK

Clicking on 'press here' will then download the report.

## 9.5. Sorting data

Where data is displayed in columns, it is usually possible to sort the data by double clicking in the column heading ie in the example below, double clicking the Supplier Name will order the data in supplier name order (ascending or descending)

**Supplier spend details**


Supplier Name	# Invoices	# POs	Invoice Spend	PO Spend
<b>Total</b>	<b>1,534</b>	<b>804</b>	<b>130,952,062</b>	<b>96,390,148</b>
Class Systems	335	0	988,786	0
Computimatic	0	79	0	5,097,222
Electrical Systems	59	0	4,582,807	0
Nuan Incorporated	0	349	0	1,000,523
Power Electronics	340	0	1,027,558	0
SecurityArk	145	40	17,589,197	5,246,058
Shiora	205	219	1,049,219	1,066,405
Speedy casp	54	74	51,902,305	57,523,545

## 10. Reports

### 10.1. Account Price Variance Reports and Group Price Variance Reports

The Price Variance reports are designed to highlight price variances across your invoices.

Price variances are identified and presented to you in table format with a summary at the top of the page.

A price variance is where there is more than one price for the same item from the same supplier.

The potential saving is calculated by:

- Identifying the lowest price
- Identifying the total quantity purchased
- Identifying the total spend for that item
- Multiplying the total quantity purchased by the lowest price and comparing the outcome to the total spend for that item

PLEASE NOTE that all Price Variance Reports report on 18 months of data (default period) and the date reporting parameters cannot be changed. Please contact Tungsten if you wish to change your default date period.

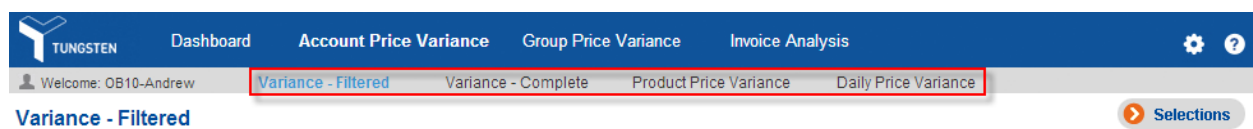
The Account Price Variance Report and the Group Price Variance report behave in exactly the same manner. The only difference is that the Account Price Variance Report should be used to report on the activity of one Buyer account, the Group Price Variance report should be used to show price variances across the group of Buyer accounts.

The Group Price Variance report is only relevant to you if you have more than one Buyer account.

If you only have one Buyer account then the Account Price Variance Report and the Group Price Variance will be the same.

The Account Price Variance Report and the Group Price Variance have four report types

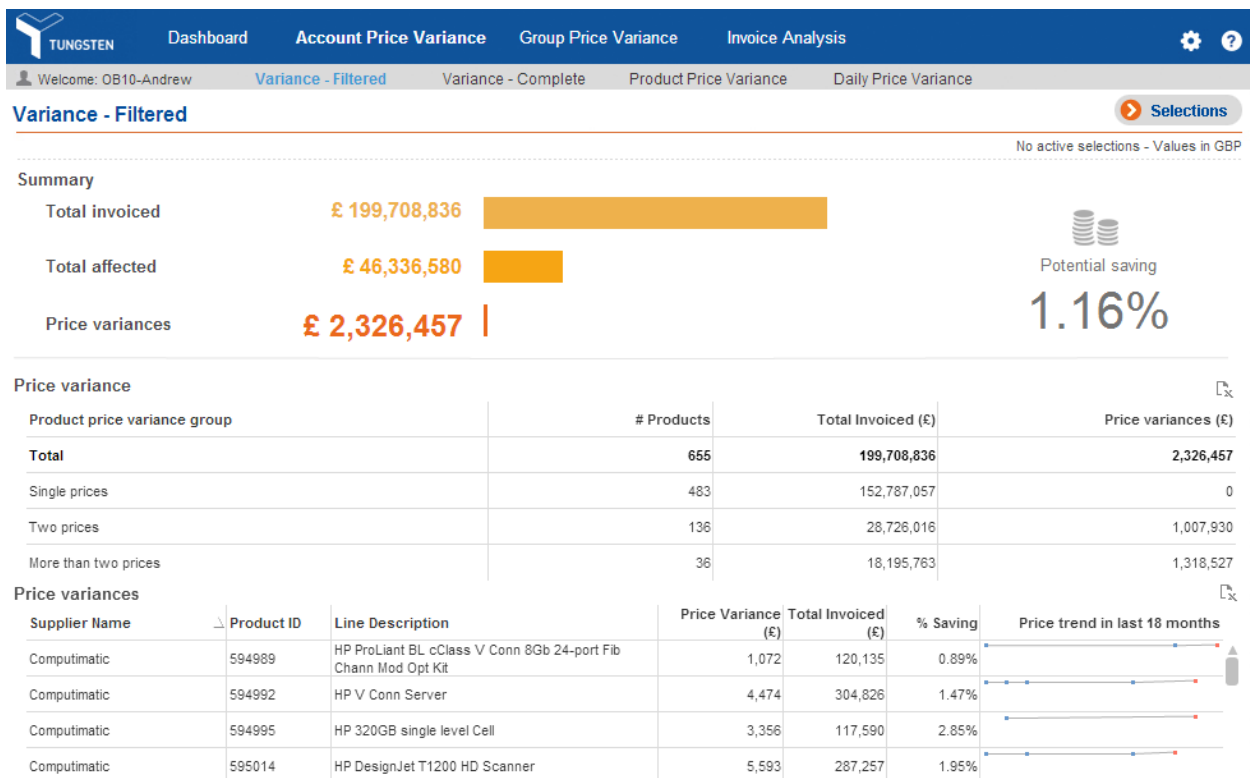
- Variance Filtered
- Variance – Complete
- Product Price Variance
- Daily Price Variance



#### 10.1.1. Account Price Variance – Variance Filtered

This report displays all items where there is a price variance of 1% - 99% in the default reporting period.





The report displays the following information:

### Summary

- Total invoiced - this is the total value of invoices during the default period
- Total affected – this is the total value of invoices that are affected by a price variance
- Price variances – this is the total potential monetary saving expressed in the base currency
- Potential saving – this is the total potential monetary saving expressed as a percentage of the total value of invoices

### Spend variance

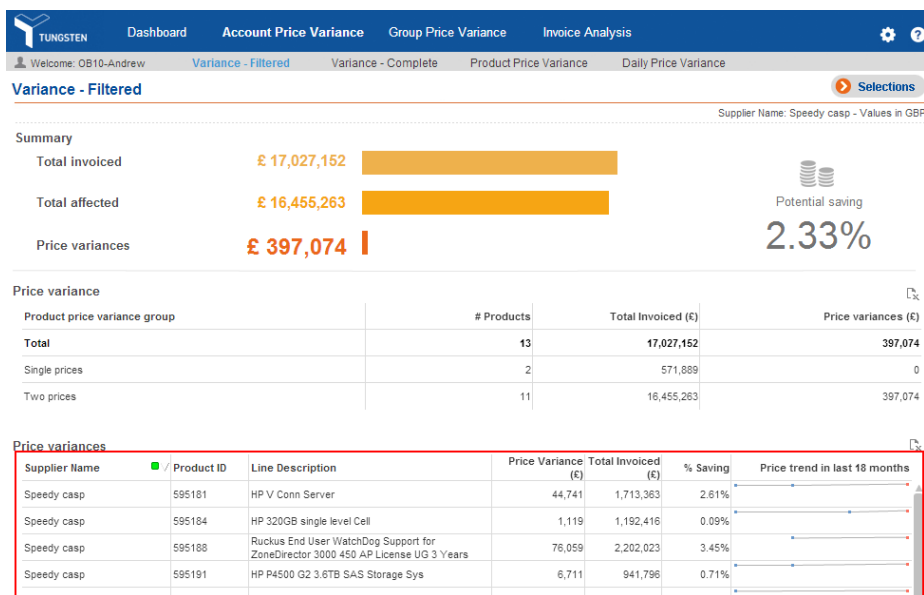
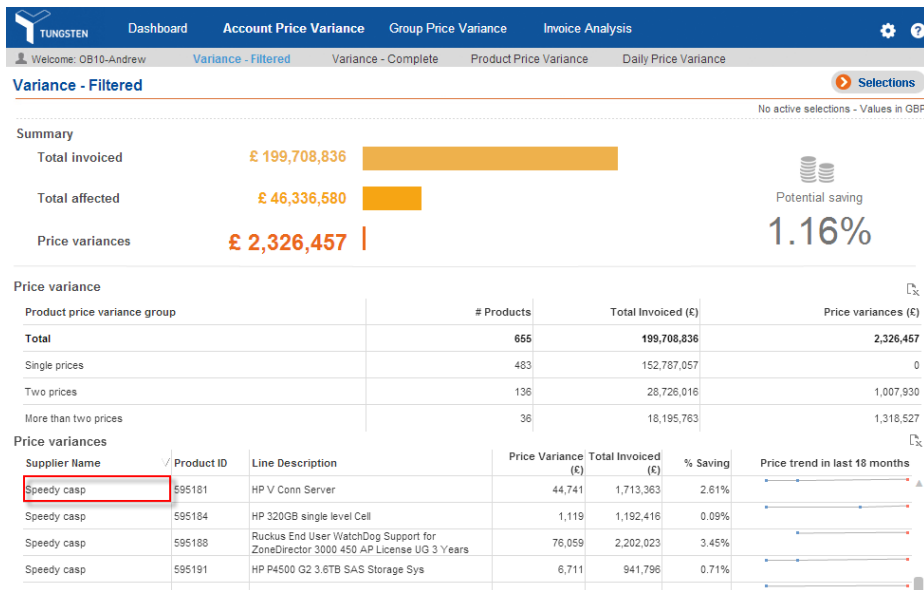
- Total – the total number of products
- The number of products where there is only one price (no price variance)
- The number of products where there are two prices
- The number of products where there are more than two prices

The columns show

- The value of the price variances
- The total value invoiced
- The % saving
- A graphical representation of the price fluctuation (so you can identify which prices are increasing and which prices have decreased etc.)

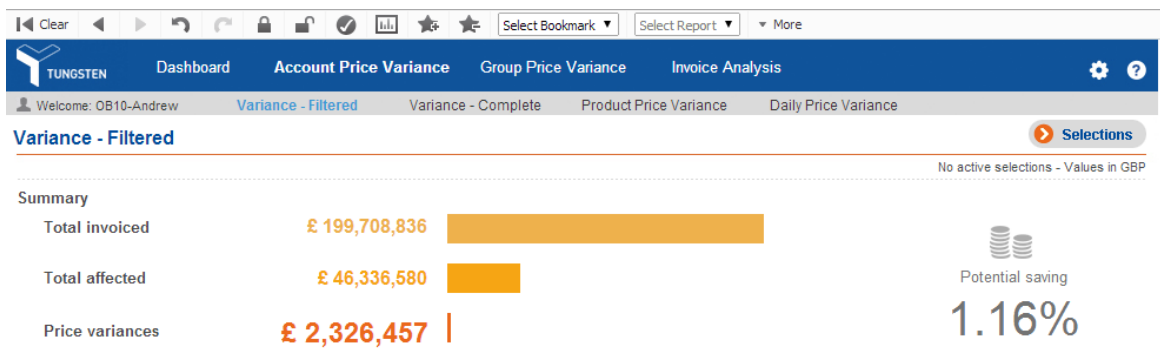
### 10.1.2. Looking at price variances by supplier

By clicking on a supplier name you will be taken to all of the price variances that are identified from that supplier



### 10.1.3. Looking at price variances by product

By clicking on a product, you will be taken to the detailed price variance for that product



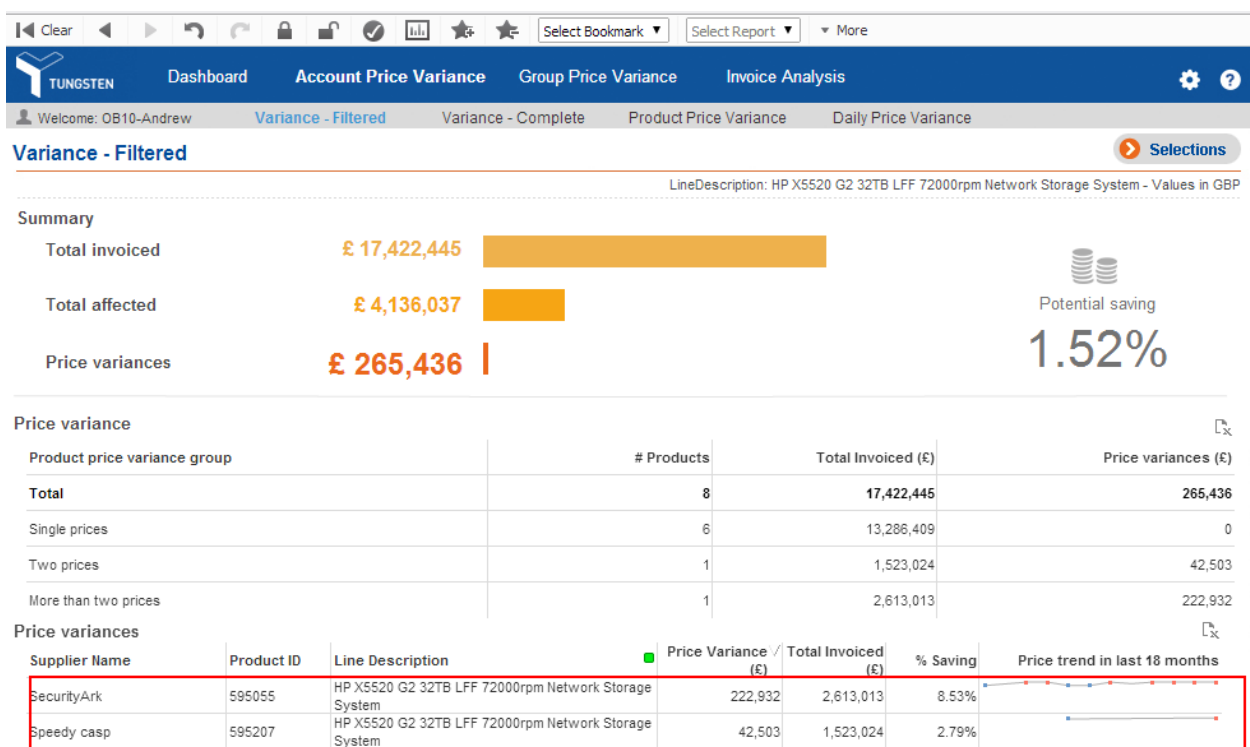
Price variance

Product price variance group	# Products	Total Invoiced (£)	Price variances (£)
Total	655	199,708,836	2,326,457
Single prices	483	152,787,057	0
Two prices	136	28,726,016	1,007,930
More than two prices	36	18,195,763	1,318,527

Price variances

Supplier Name	Product ID	Line Description	Price Variance (£)	Total Invoiced (£)	% Saving	Price trend in last 18 months
SecurityArk	595055	HP X5520 G2 32TB LFF 72000rpm Network Storage System	222,932	2,613,013	8.53%	
SecurityArk	595046	Ruckus End User WatchDog Support for ZoneDirector 3000 450 AP License UG 3 Years	188,699	2,485,451	7.59%	
SecurityArk	595048	HP MSL8096 4 LTO5 Ultrium 3280 FC Lib	157,061	1,474,825	10.65%	
SecurityArk	595056	HP HP X5520 G2 16.2TB SFF 10K Network Storage System	155,481	1,940,274	8.01%	

If there is more than one supplier for that product then you are given a list of suppliers and a summary of the price variance



Clicking on a product will provide the product price variance details for that product from that supplier. The small graph in the final column of the table displays the price history; blue dots show where the price has decreased, red dots show where the price has increased


### Variance - Filtered

[Selections](#)

LineDescription: HP X5520 G2 32TB LFF 72000rpm Network Storage System - Values in GBP

#### Summary

Total invoiced	£ 17,422,445	
Total affected	£ 4,136,037	
Price variances	£ 265,436	

  
 Potential saving  
**1.52%**

#### Price variance

Product price variance group	# Products	Total Invoiced (£)	Price variances (£)
<b>Total</b>	<b>8</b>	<b>17,422,445</b>	<b>265,436</b>
Single prices	6	13,266,409	0
Two prices	1	1,523,024	42,503
More than two prices	1	2,613,013	222,932

#### Price variances

Supplier Name	Product ID	Line Description	Price Variance (£)	Total Invoiced (£)	% Saving	Price trend in last 18 months
SecurityArk	595055	HP X5520 G2 32TB LFF 72000rpm Network Storage System	222,932	2,613,013	8.53%	
<b>Speedy casp</b>	<b>595207</b>	<b>HP X5520 G2 32TB LFF 72000rpm Network Storage System</b>	<b>42,503</b>	<b>1,523,024</b>	<b>2.79%</b>	


### Variance - Filtered

[Selections](#)

LineDescription: HP X5520 G2 32TB LFF 72000rpm Network Storage System - Supplier Name: Speedy casp - Values in GBP

#### Summary

Total invoiced	£ 1,523,024	
Total affected	£ 1,523,024	
Price variances	£ 42,503	

  
 Potential saving  
**2.79%**

#### Price variance

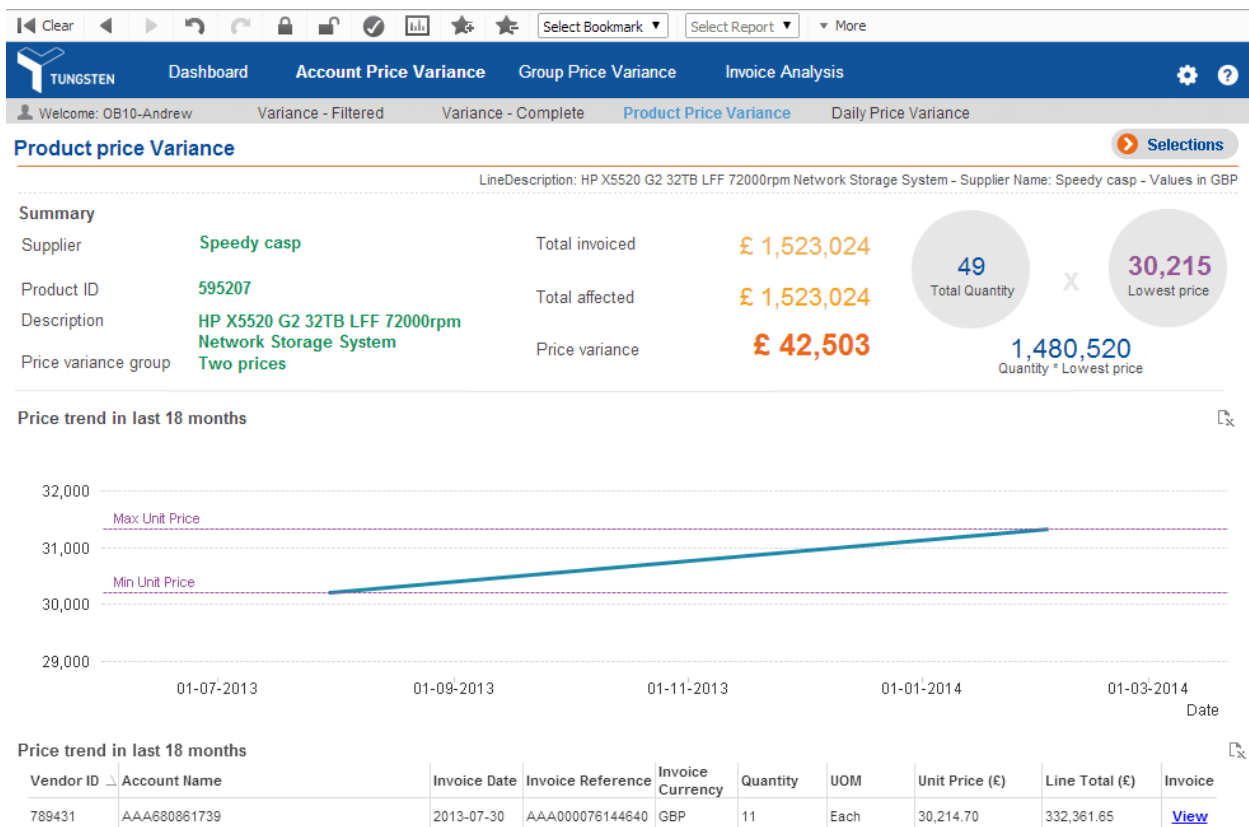
Product price variance group	# Products	Total Invoiced (£)	Price variances (£)
<b>Total</b>	<b>1</b>	<b>1,523,024</b>	<b>42,503</b>
Two prices	1	1,523,024	42,503

#### Price variances

Supplier Name	Product ID	Line Description	Price Variance (£)	Total Invoiced (£)	% Saving	Price trend in last 18 months
Speedy casp	595207	HP X5520 G2 32TB LFF 72000rpm Network Storage System	42,503	1,523,024	2.79%	

[Click here to see all details for this price variance](#)

Clicking on 'click here to see all details for this Price Variance' (see above) will take you to the product price variance screen.



The screen displays

#### Summary

- The supplier name
- Product ID (this is the Tungsten internal product ID, not known to the supplier)
- The full line item description, taken from the suppliers invoice
- The price variance group (two prices or more than two prices)

#### Price Variance details

- Total invoiced - the total expenditure for the item within the period
- Total affected the spend that is affected by price variances – NB if there is only one product selected then the total paid and the total affected are identical
- Price Variance – the difference between the total price paid and what would have been paid if all items were sourced at the lowest price
- The total quantity of the item purchased
- The lowest unit price paid
- The total value of the quantity multiplied by the lowest unit price

#### Graph

- A graph displaying the unit price history

#### Table

#### The table displays

- Your Vendor ID
- The invoice reference number (the OB10 AAA number)
- The date of the invoice
- The invoice currency

### 10.1.4. Looking at original invoices

At any time you may wish to view the original invoice.

If you click on the view button in the final column, you will be taken to the Tungsten Archive, where you can download and view a copy of the invoice

#### Price trend in last 18 months

VendorID	InvoiceRef	DateInvoice	Document Currency	Quantity	Unit Price	NetTotal	Invoice
<b>Total</b>				<b>115</b>	<b>32,579.20</b>	<b>3,844,345.60</b>	
789431	AAA000076144690	2012-12-12	GBP	55	32,579.20	1,791,856.00	<a href="#">View</a>
789431	AAA000076144711	2013-02-02	GBP	30	34,208.16	1,026,244.80	<a href="#">View</a>
789431	AAA000076144641	2013-07-30	GBP	30	34,208.16	1,026,244.80	<a href="#">View</a>

This functionality is useful if you want to look at 2 invoices when assessing a price variance.

## 10.2. Looking at daily and weekly price variances

At any time you may wish to look at daily and weekly price variance. This will enable you to spot price variances in products before the invoice has been paid.

The report displays the following information:

- The daily price variance report shows invoices with a submission date of yesterday and with a price variance on a particular product from a certain supplier. The system compares the data from yesterday with the last 18 months of data.
- The weekly price variance report shows invoices with a submission date from the last 7 days of data and with a price variance on a particular product from a certain supplier. The system compares the data from the last 7 days with the last 18 months of data.

## Daily price variance

[Selections](#)

No active selections - Values in GBP

Complete

Filtered

### Yesterday's price variance

Invoice Date	Invoice Currency	Line Description	Product ID	Buyer Name	Supplier Name	Invoice Reference	Unit Price (£)	Account Min Price ...	Price Variance (...)	Analyse
2014-09-17	GBP	HP 640 GB Multi level Cell	594998	AAA680861739	Computimatic	AAA000085724498	12,712.66	12,659.66	53.00	<a href="#">Analyse</a>
2014-09-17	GBP	HP DesignJet Z6200 60" Printer	595010	AAA680861739	Computimatic	AAA000085724499	14,901.07	14,843.07	58.00	<a href="#">Analyse</a>

### Last 7 days price variance

Invoice Date	Invoice Currency	Line Description	Product ID	Buyer Name	Supplier Name	Invoice Reference	Unit Price (£)	Account Min Price (£)	Price Variance (£)	Analyse
2014-09-16	GBP	HP DesignJet Z6200 60" Printer	595199	AAA680861739	Speedy casp	AAA000085647444	15,012.12	14,843.07	169.05	<a href="#">Analyse</a>
2014-09-17	GBP	HP 640 GB Multi level Cell	594998	AAA680861739	Computimatic	AAA000085724498	12,712.66	12,659.66	53.00	<a href="#">Analyse</a>
2014-09-17	GBP	HP DesignJet Z6200 60" Printer	595010	AAA680861739	Computimatic	AAA000085724499	14,901.07	14,843.07	58.00	<a href="#">Analyse</a>
2014-09-22	GBP	Ruckus End User WatchDog Support for ZoneDirector 3000 450 AP License UG 3 ...	595002	AAA680861739	Computimatic	AAA000086042967	39,729.24	28,729.24	33,000.00	<a href="#">Analyse</a>
2014-09-22	GBP	HP DesignJet Z6200 60" Printer	595010	AAA680861739	Computimatic	AAA000086042966	16,136.26	14,843.07	5,172.76	<a href="#">Analyse</a>
2014-09-22	GBP	APC Symmetra PX 16kW All-In-One Scalable to 48kW 400V 400 3PH	595029	AAA680861739	Computimatic	AAA000086042968	21,095.06	18,999.81	8,381.00	<a href="#">Analyse</a>

Both the yesterday's price variance report and the daily price variance report contain the same columns of data. These are:

- Invoice date
- Invoice currency
- Product ID
- Buyer name
- Supplier name
- Invoice reference
- Unit Price
- Account minimum price
- Price Variance
- Analyse

The price variance column will look at the difference between the Account minimum price and the unit price. By clicking on the "Analyse" button on a particular product, the application will redirect you to the "Product Price Variance" screen for the particular product which has been clicked on.

N.B By clicking on the "analyse" button, the application will open up a new tab. When you have finished analysing the particular price variance, you should either close this tab or "clear" the selections (despite nothing apparently selected in the query bar). This way, the data will be cleared.

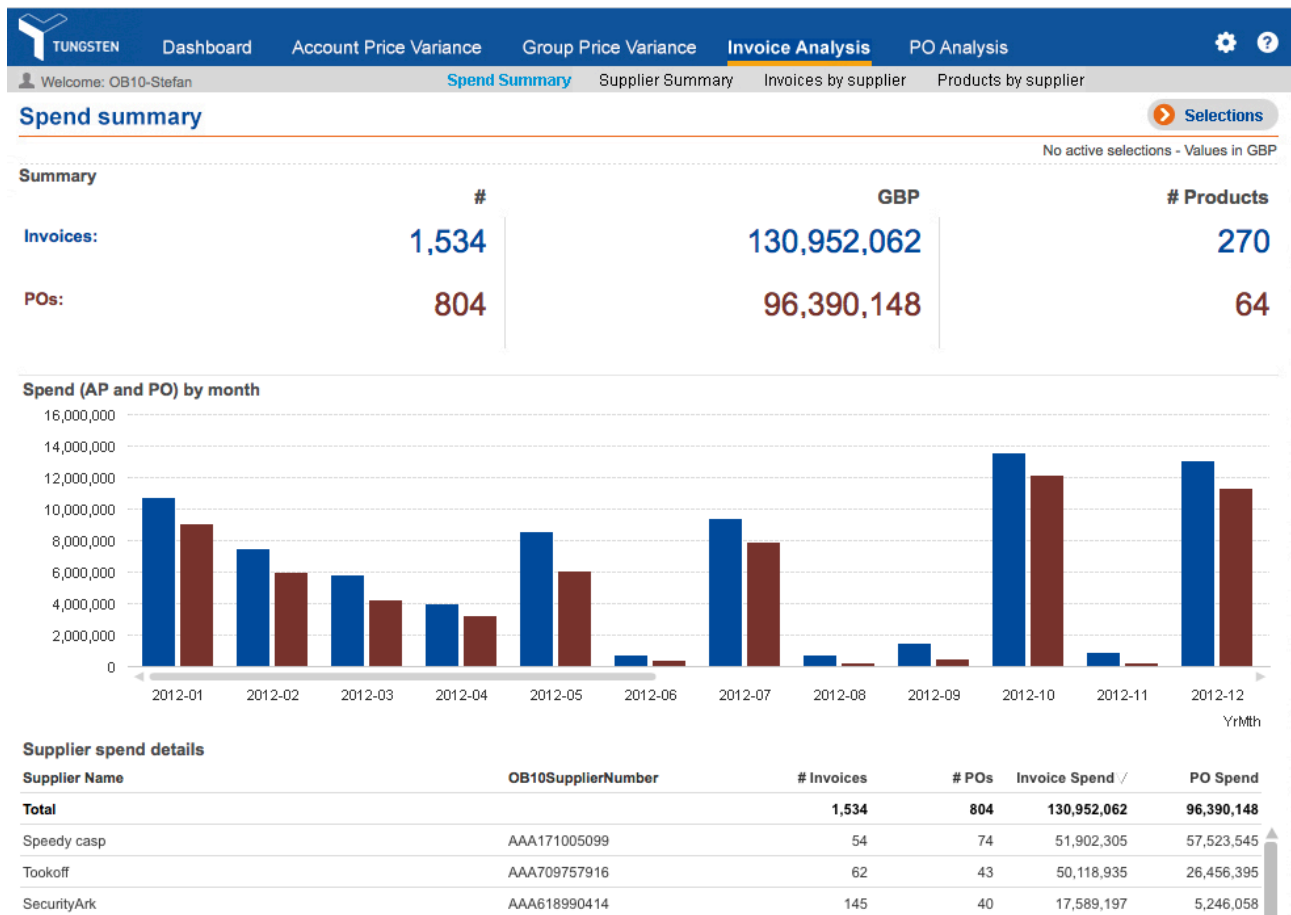
There are two filters - "Complete" and "Filtered". The complete tab will show you all the price variances of products. The filtered tab will show you where there have been price variances for products of 100% and under.

## 11. Invoice Analysis

Invoice Analysis reporting provides you with the ability to report on supplier activity.

### 11.1. Spend Summary

The spend summary screen shows an overview of your invoice and PO transactions



The summary shows

- The number of invoices and PO's processed
- The value of invoices and PO's processed
- The number of different products that are present on invoices and PO's

The graph shows the invoice and PO value month on month

The table shows:

- The supplier name
- The supplier OB10 Number
- The number of invoices processed and the total invoice value
- The number of PO's processed and the total PO value

The table can be sorted by any of the columns

Clicking on a supplier name will take you the supplier spend summary where you will see the spend details for a particular supplier



## Spend summary

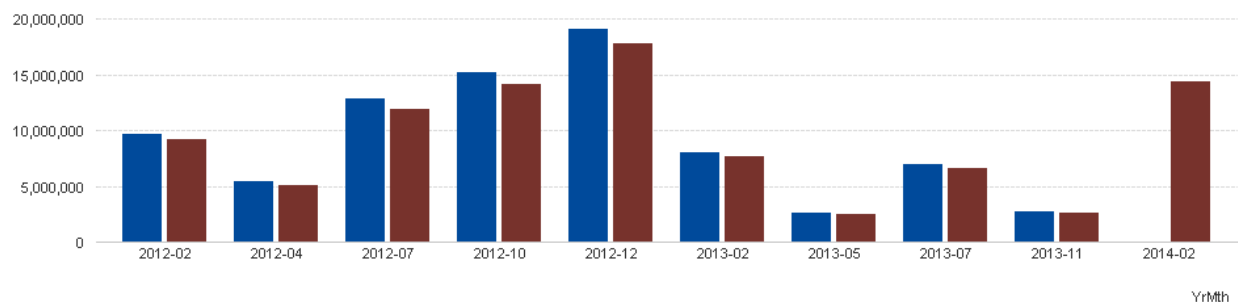
[Selections](#)

Supplier Name: Speedy casp - Values in USD

### Summary

	#	USD	# Products
Invoices:	54	82,262,966	15
POs:	74	91,718,994	15

### Spend (AP and PO) by month



### Supplier spend details

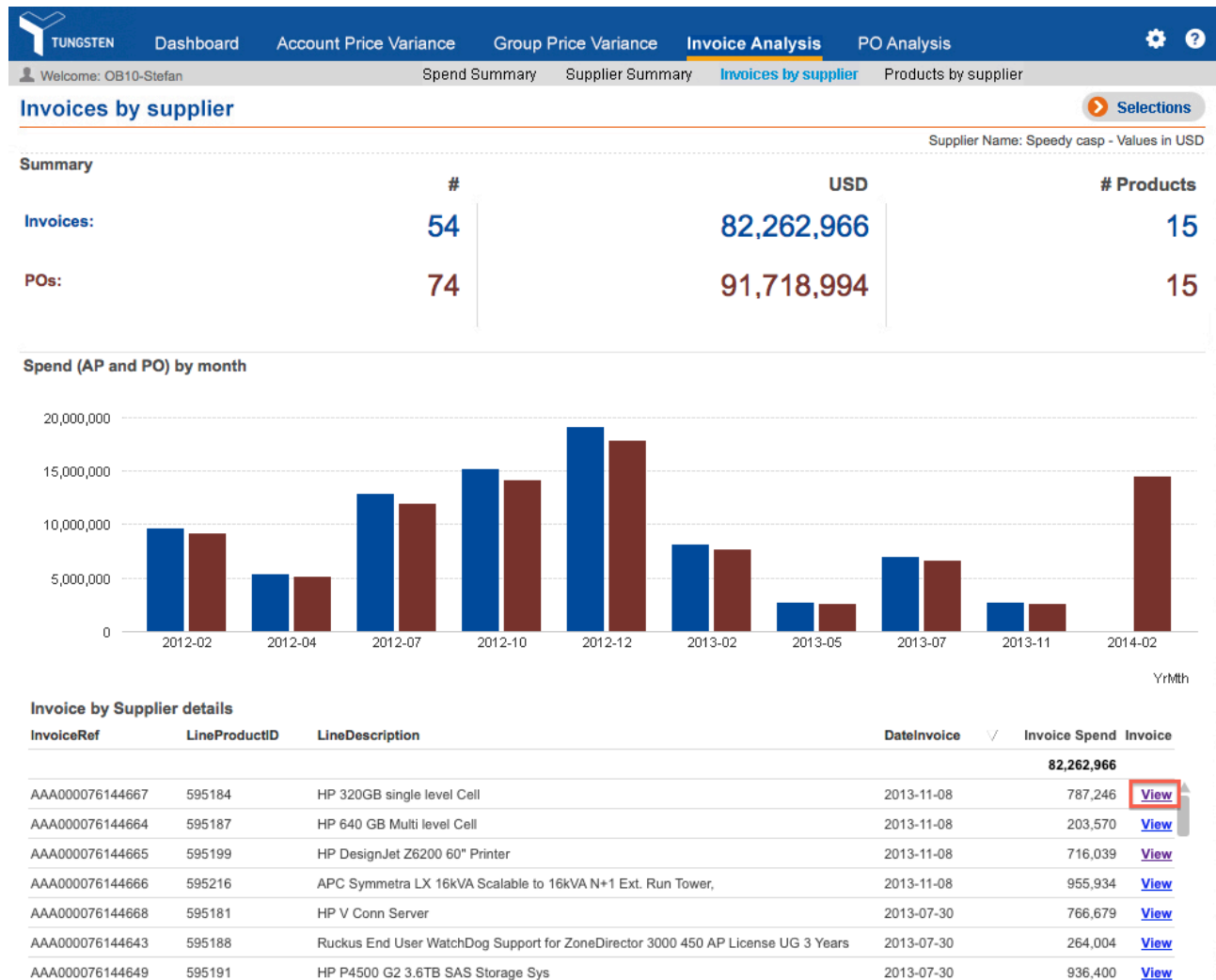
Supplier Name	OB10SupplierNumber	# Invoices	# POs	Invoice Spend /	PO Spend
<b>Total</b>		<b>54</b>	<b>74</b>	<b>82,262,966</b>	<b>91,718,994</b>
Speedy casp	AAA171005099	54	74	82,262,966	91,718,994

[Click here to see all invoices from this supplier](#)

Clicking on 'click here to see all invoices from this supplier' (see above) will take you to the Invoices by supplier report.

## 11.2. Invoices by supplier report

This report shows full detail of the supplier activity as well as a list of invoices.



The summary shows

- The number of invoices and PO's processed
- The value of invoices and PO's processed
- The number of different products that are present on invoices and PO's

The graph shows the invoice and PO value month on month

The table shows

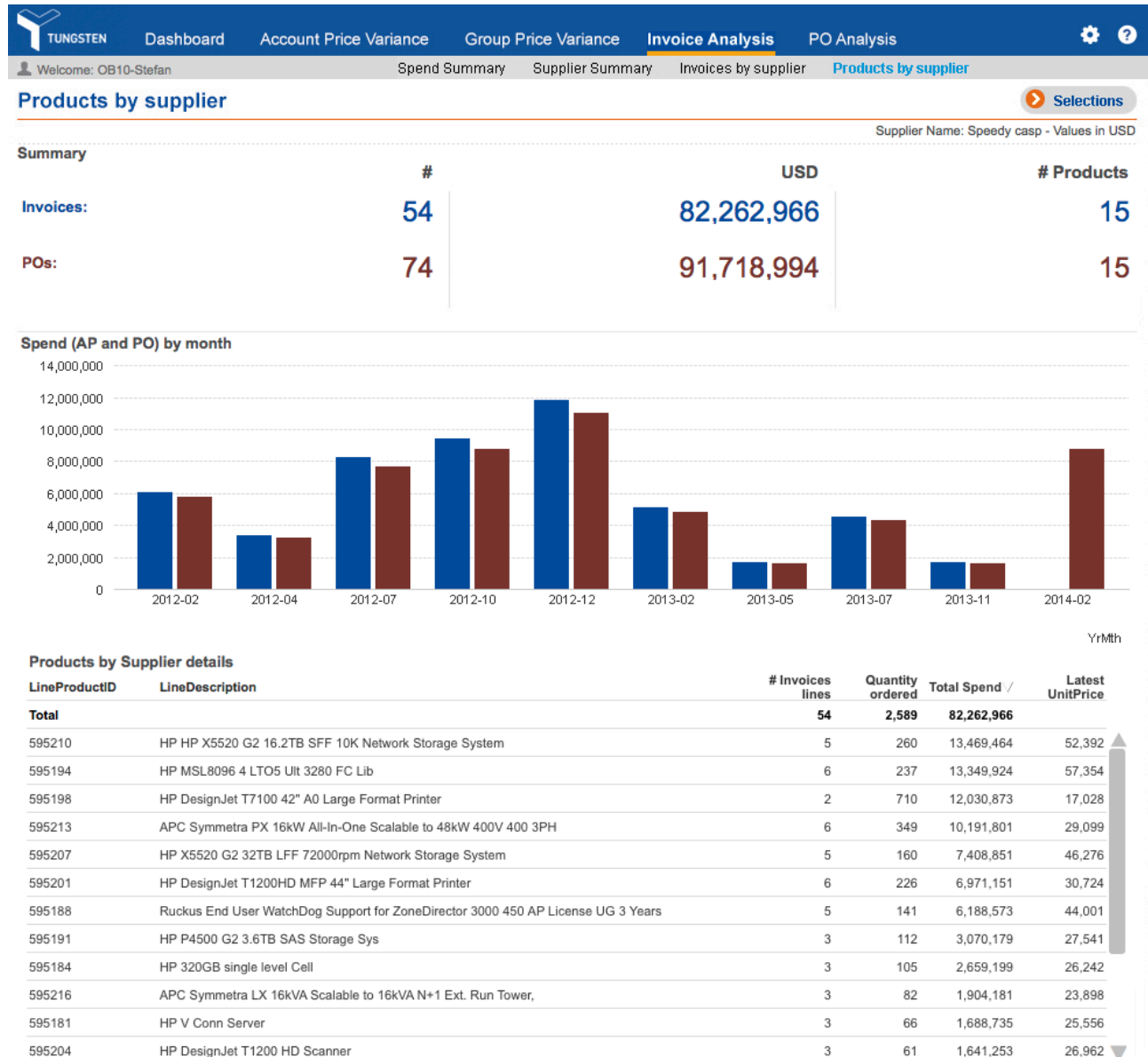
- The OB10 invoice number
- The Product ID
- The line item description
- The invoice date and value

The table can be sorted by any of the columns

If you click on the view button in the final column, you will be taken to the Tungsten Archive, where you can download and view a copy of the invoice

## 11.3. Products by supplier report

This report shows full detail of the supplier activity as well as a list of products.



The summary shows

- The number of invoices and PO's processed
- The value of invoices and PO's processed
- The number of different products that are present on invoices and PO's

The graph shows the invoice and PO value month on month

The table shows

- The Product ID
- The line item description
- The number of invoice lines that the product appears on
- The invoiced quantity of the product
- The total invoiced value
- The latest unit price

The table can be sorted by any of the columns

If you click on the view button in the final column, you will be taken to the Tungsten Archive, where you can download and view a copy of the invoice

## 12. FAQs

### 1. Can I export to excel?

Yes, where you see the “send to excel button” usually in the top right corner of any table, you are able to export the report to excel. Everything within that table will be exported. Alternatively, you could right click in the report itself and click “export”.

### 2. How do I sort tables in ascending or descending order?

Wherever you see a table, you are able to sort alphabetically or sort values in ascending or descending order. To do this, double click on the title of the column. This may be useful, for example, when you are looking to find out the top transacting suppliers in your organisation or find products with the most price variance.

### 3. What is the difference between Account Price Variance and Group Price Variance?

The Account Price Variance screen should be used if you wish to analyse the price variance of products for one buyer entity account. The Group Price Variance screen should be used if you wish to look at the price variance for two or more entities. The difference in logic between the two is that if using the Account Price Variance screen and you had one product selected each with a different price across three entities, then the system would record it as two or more price variances. If however, you looked at the same criteria in the Group Price Variance Screen, the system would mark it as one price variance.

### 4. Under the Price Variance tabs, what is the difference between “Variance filtered” and “Variance Complete”

The “Variance Filtered” tab excludes any products where there is a price variance of more than 100%. The “Variance Complete” tab includes all price variances.

### 5. How do I select multiple suppliers and products?

You can click and drag on suppliers, dates and buyer entities in the selections tab. You can also do this in any tables. You can also select multiple items by holding down CTL and selecting. Finally by right clicking on the items in the selections box, you are able to “select all”, “select excluded” or “select possible”. This final option can be used where you have a date selected and wish to select all products which have been invoiced in that date period.

### 6. Why on the selection panel, are some months, products and suppliers greyed out when I make a selection?

This is because with the existing criteria you have selected, other selections are not selectable. For example, if you select a particular supplier in the selection panel – you will see certain months and products are greyed out. This is because this supplier did not invoice you in those months and does not invoice you for certain products.

### 7. Why do I sometimes receive a “lost connection to the server” message?

This can be because of one of two reasons. Either because the application has been left idle for some time and has to reconnect, or because the query you have selected is unmanageably large. This second occurrence tends to happen if you “jump” tabs. For example, under the “invoice analysis” tab if you were to directly go to the “invoices by supplier” tab without selecting any suppliers, in effect you are looking for all invoices from all suppliers in the last two years. It is likely that the application will attempt to bring back the data, but timeout because the query is bringing back so much data. You will then receive a “lost connection to the server” message. Eliminate this by selecting suppliers first.

**8. What is the date period that is being reported on?**

Currently, the system is reporting from the past two years of invoice and PO data. If no dates are pre-selected, the “Dashboard”, “Invoice Analysis” and “PO Analysis” screens will report on the entire data set. The “Account and Group Price Variance” screens however, will only report on the past eighteen months of data. You cannot change the price variance report date in the application which is why the date panel in the selections tab is not selectable when on the price variance tab.

**9. If Tungsten is exporting the last two years of data, why am I seeing invoices from dates before that period?**

TNA is exporting the past two years of data based on submission date as it is a system generated date. However, there may be invoices with invoice dates which are substantially different from the submission date. It is for this reason you may see the occasional invoice with an invoice date from 2010 for example. If you were to check the submission date of the invoice, it will fall within the past two years.

**10. I am looking on the product price variance screen. Why does the unit price not equal that of the PDF?**

Please ensure that you have set the currency of the application as the same currency of the invoice. You can do this by clicking on the cog icon in the top right hand corner and selecting the correct currency. Alternatively, the difference may be due to the fact the item appears on more than one line on the same invoice. Sum together the unit price totals in the invoice to equal the unit price in the application.

**11. I want to fix a certain piece of selection criteria such as a supplier but change other aspects of the criteria such as date and product. How do I keep the supplier selected?**

Select the supplier and then click on lock symbol in the toolbar at the head of the page. Then you can select different dates or products and when you clear the data, it will only clear the items not locked. To unlock the item click on the unlock icon and press clear.

**12. Where can I find what I have selected?**

As you build your query, you will see the criteria you have selected below the “selections” button. Alternatively you can click on the tick symbol in the toolbar.

## 13. Known Issues

### 13.1. Apple Computers

In the selections dialog box, cmd – left click locks the application. To resolve clear all selections or reload the application





# e-Invoice Compliant Countries

Operational Briefing, September, 2014

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

## Table of Contents

1. Document purpose .....	3
2. Introduction .....	4
3. e-Invoicing Compliance overview .....	5
3.1. Support provided to suppliers .....	5
3.2. Support provided to the Client .....	6
4. Country-specific Tungsten Network Processing .....	7
4.1. Digital Signatures .....	7
4.2. Mexico .....	7
4.3. Brazil .....	7
4.4. Bulgaria .....	8
4.5. Hungary and Italy .....	8
4.6. Turkey .....	8
4.7. Registration with tax authorities .....	9
5. Tungsten Network Geographic Scope .....	10
5.1. Tungsten Network e-Invoice Compliant Countries .....	10
5.2. Tungsten Network Commercial Invoice Data Transfer Service Countries .....	10

## 1. Document purpose

This document describes where and how Tungsten Network enables tax and regulatory compliant e-Invoicing between trading partners.

### Definition of terms

Term	Definition
“Commercial Invoice Data Transfer Service”	Has the meaning given to it in 2.
“Tungsten Network e-invoice Compliant Countries”	Means the countries listed in 5.1.

Capitalised terms used and not defined in this document have the meanings assigned to them in the MSA or the accompanying SOW. References to MSA and SOW refer to the accompanying master services agreement and (if applicable) statement of work in place between Tungsten Network and the Client in relation to the provision of the e-invoicing service.

## 2. Introduction

Tungsten Network provides a “Commercial Invoice Data Transfer Service” for suppliers located in every country in the world unless government embargo or other legal or local restrictions apply.

The type of service provided depends upon the geographic location of the Supplier.

For select major countries located in The Americas, Europe Middle East and Asia Pacific, Tungsten Network performs a pre-delivery compliance check to ensure that the invoice qualifies as the legal invoice of record (e.g. Artifact) based on the rules and regulations of the specific country. Tungsten Network then creates the legal invoice on behalf (and with the authorisation) of the Suppliers. A list of countries where Tungsten Network currently enables tax and regulatory e-Invoicing between trading partners is provided in section 5.1 below.

For invoices from Suppliers located outside of the Tungsten Network e-Invoice Compliant Countries, Tungsten Network provides a Commercial Invoice Data Transfer Service which enables the electronic transfer of the commercial invoice only. For this service, the regulatory component of the Tungsten Network compliance check is not performed and Tungsten Network does not create or process the legal invoice (see the e-Invoicing Service Specification for further information). A list of countries where Tungsten Network currently provides a Commercial Invoice Data Transfer Service is provided below in section 5.2 below.

Unlike most other business documents, the invoice is subject to many legal and fiscal rules. While these rules will vary from country to country, they generally cover five main areas:

1. Rules governing the issue of invoices. When invoices must be issued and how they must be delivered to customers;
2. The information that must be present on an invoice;
3. How the invoice is authenticated via a digital signature;
4. Where the invoice is stored;
5. The reporting and retention periods for invoices.

In some of these countries there might also be unique local processing requirements or conditions that differ from our standard e-invoicing or Commercial Invoice Data Transfer Service requirements. This document describes these unique country-specific processing requirements and how Tungsten Network has adapted our services to comply with these.

### 3. e-Invoicing Compliance overview

Tax regulations vary significantly from country to country. Tungsten Network works closely with its compliance partner, PwC, to check and interpret the country-specific compliance requirements within the Tungsten Network e-Invoice Compliant Countries for electronic invoicing and electronic archiving. While these requirements are often complex and therefore open to interpretation, the ultimate responsibility resides with each client to ensure that they “comply with the law”.

To support our customers and to provide them with confidence in our assessment and implementation of the local requirements in the Tungsten Network e-Invoice Compliant Countries, we provide customers with background information, including country-specific compliance guides. This enables our customers (and their tax advisors) to assess how Tungsten Network implements and complies with these requirements and supports our customers in meeting their legal obligations.

While Tungsten Network supports suppliers with their responsibility to submit tax-compliant electronic invoices as outlined below, the supplier retains ultimate responsibility by law for providing the invoice content in accordance with applicable local law and for the accuracy of that content.

Similarly, the client remains responsible by law for the invoices and accounting and reporting procedures. Tungsten Network can support the client in the effectiveness of these procedures by implementing additional business rules to perform content validation during the processing of supplier invoices. These rules are agreed with the client and built into the core system.

#### 3.1. Support provided to suppliers

Tungsten Network provides the following support to suppliers located in a Tungsten Network e-Invoice Compliant Country to enable them to submit tax and regulatory compliant invoices.

- Ensuring that the legally required data fields for invoices in the source country (within the Tungsten Network e-Invoice Compliant Countries) are made available to a supplier for completion.  
  
This is achieved by verifying mandatory country-specific data components. In most cases, Tungsten Network will check for the presence of data only (e.g. VAT ID, addresses, line descriptions and amounts). For certain mandatory fields, Tungsten Network may extract and add the mandatory date element from standing data if provided to Tungsten Network by the supplier for that purpose (for example, the supplier’s share capital and/or the names of the supplier’s directors).
- Invoices that are submitted by a supplier that fail any of these mandatory country-specific checks are not accepted for processing and delivery to the supplier’s customer; these invoices are rejected back to the supplier with an explanation of the reason for the failure so that the supplier can correct and re-submit the invoice.
- Applying digital signatures in order to provide the proof of authenticity of origin and integrity of content for all invoices submitted via Tungsten Network. Additionally, if a Tungsten Network e-Invoice Compliant Country requires that the legal invoice (the PDF or the data file) is digitally signed, we comply with applicable invoice signature legislation.
- Providing template notification letters that a supplier can use to submit to their local tax authority where notification of usage of the Tungsten Network Archive is required in accordance with applicable local legislation.

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

- Providing a copy of the ISAE 3402 and ISO 27001 documentation to help clients create their own internal process documentation showing their validation and alignment of the outsourced business processes with Tungsten Network internal control systems.
- Storing electronic invoices (with a source and destination country within the Tungsten Network e-Invoice Compliant Countries) in the “Tungsten Network Archive” in accordance with applicable local legislation where that archiving service is used by the supplier.

### 3.2. Support provided to the Client

Tungsten Network provides the following support to clients to enable them to receive and process tax and regulatory compliant invoices.

- Verifying that mandatory invoice content is present on invoices submitted by, or on behalf of, an “invoice from” source located within the Tungsten Network e-Invoice Compliant Countries and where practicable in correct form.
- Verifying the authenticity of origin and integrity of data of the legal invoice on behalf of the client in accordance with applicable legislation in the Tungsten Network e-Invoice Compliant Countries. This is performed using the Digital Signature Verification Service which is an optional e-Invoicing service that the client can elect to implement.
- In Tungsten Network e-Invoicing Compliant Countries, providing template notification letters that the client can use to submit to its local tax authority where notification of usage of the Tungsten Network Archive is required in accordance with applicable local legislation.
- Storing electronic invoices (with a source and destination country within the Tungsten Network e-Invoice Compliant Countries) processed via Tungsten Network in the Tungsten Network Archive in accordance with applicable local legislation where that service is used by the client.
- Providing a copy of the ISAE 3402 and ISO 27001 documentation to help clients create their own internal process documentation showing their validation and alignment of the outsourced business processes with Tungsten Network internal control systems.

## 4. Country-specific Tungsten Network Processing

As noted above, in some Tungsten Network e-Invoice Compliant Countries there are unique local processing requirements or conditions, as described in the following sections.

### 4.1. Digital Signatures

In countries where the signature requirements mandate the use of a locally accredited certificate (e.g. Switzerland), Tungsten Network will apply the signature to ensure compliance with those local signature laws.

### 4.2. Mexico

Tungsten Network works with a local partner, in order to comply with local requirements in Mexico. Tungsten Network's current local partner is Buzon E.

The process in Mexico is as follows:

- Suppliers will be contacted and informed about client-related required data to be added to the legal invoice.
- Suppliers send the legal invoice (CDFi) to Tungsten Network.
- Tungsten Network will then send the invoice to its local partner for legal validations.
- Upon success Tungsten Network creates a Client ERP-file and Tungsten Network workflow image.

The inclusion of Mexico in a client's scope (together with any necessary additional terms and pricing) must be separately agreed in writing between Tungsten Network and the client.

The following services which are outlined in the Tungsten Network e-Invoicing Service Specification are not available in Mexico:

- The invoice submission functions referred to in 4.1.2 of the e-Invoicing Service Specification; and

Paper invoice conversion targets offered by Tungsten Network do not apply in Mexico as e-invoicing is already mandatory in this country. The Web Form Service is not available for suppliers in Mexico.

### 4.3. Brazil

Tungsten Network works with a local in order to comply with local requirements in Brazil. Tungsten Network's current local partner is Comprova who provide a leading digital signature platform. The local partner will hold all signatures in their own cloud in a client account.

The process in Brazil is as follows:

- a) Suppliers will be informed about the client-related data that is required in the legal invoice.
- b) A separate process is required to be set up for goods invoices (NF-e) and service invoices (NF-s). Tungsten Network's local partner will be involved in the set up process to ensure individual tax permutations are addressed.
- c) The supplier creates the legal invoice and submits it to Tungsten Network.
- d) Tungsten Network receives an email with the legal invoice (whether NF-e and/or NF-s) in XML format and transfers it to its local partner for validation.
- e) The local partner submits the legal invoice to SEFAZ (the tax authorities) to validate it meets SEFAZ formatting requirements (e.g. it must be formatted correctly and the required data fields are filled

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.

in correctly). As the legal invoice is submitted to the relevant tax authorities, Tungsten Network cannot be held responsible for any delays, interruptions, loss of data, or other failures in processing caused by such local tax authorities.

- f) The supplier is responsible for delivering a human readable document (DANF-e) to the client as required under Brazilian laws.
- g) As an optional service, clients can select a Tax Validation Service via Tungsten Network's local partner to ensure the tax integrity of invoices. This service will be at an additional cost.
- h) Upon successful validation, Tungsten Network will create a client ERP-file and workflow image and submit it to the client.

The inclusion of Brazil in a client's scope (together with any necessary additional terms and pricing) must be separately agreed in writing between Tungsten Network and the client.

Paper invoice conversion targets offered by Tungsten Network do not apply in Brazil as e-invoicing is already mandatory in this country. The Web Form Service is not available for suppliers in Brazil.

#### 4.4. Bulgaria

To comply with Bulgarian law, a client receiving an e-Invoice from a Bulgarian supplier must explicitly acknowledge receipt of the invoice before processing the invoice. Verification of the digital signature on authenticity and integrity is not deemed sufficient, as the verification information is not routed back to the supplier. The Bulgarian Government therefore requires that an additional message is issued to the supplier, acknowledging receipt of the e-Invoice by client.

Due to this requirement, client must participate in the Tungsten Network Invoice Status Service and use it to provide Bulgarian supplier's with (at least) the status "Received" message. Please refer to the "Tungsten Network Invoice Status Service Specification" for more information.

#### 4.5. Hungary and Italy

When the client is registered for taxes in Hungary and Italy, local law in those countries requires that all invoices stored by Tungsten Network for those countries will be time-stamped within the required timeframe.

#### 4.6. Saudi Arabia and United Arab Emirates

It is not necessary for electronic invoices to be tax compliant in Saudi Arabia or the United Arab Emirates, and therefore the tax compliance component of the e-invoicing service is not provided for in these jurisdictions.

#### 4.7. Turkey

All companies mentioned in the Turkish Government decrees and all suppliers and their clients have to be registered with the Turkish Government and enabled for electronic invoices. Tungsten Network is required to use a locally accredited service provider, currently Digital Planet. For Turkey Tungsten Network will act as an integrated processing service to enable straight through processing and to check invoices against the client rules.

The process for Turkey is as follows:

NOTICE: The information within this document is proprietary to Tungsten and is intended for use by employees, business partners and customers. It may not be copied, duplicated, used in any way, or passed to any third party without the prior written consent of Tungsten.



- The client needs to register with the Turkish Government for electronic invoicing and obtain the necessary credentials from the Government.
- The client will need to upload their credentials to the Turkish Government system and authorise its local partner to retrieve the invoices on the client's behalf.
- Suppliers will be contacted and informed about client-related required data to be added to the legal invoice.
- Tungsten Network will only support the Commercial Invoice type. It is the invoice type that can be cancelled.
- The supplier will submit an invoice in XML format to the Turkish Government. As the legal invoice is submitted to the relevant tax authorities, Tungsten Network cannot be held responsible for any delays, interruptions, loss of data, or other failures in processing caused by such local tax authorities.
- The Turkish Government is responsible for performing all compliance checks and for creating the legal invoice.
- Tungsten Network/its local partner will retrieve the legal invoices from the Turkish Government and process them through the standard Tungsten Network process on to the client ERP system.
- If the legal invoices do not meet the client's requirements then the invoice will go through a cancellation process set out by the Turkish Government where Tungsten Network will reject it back to the supplier (using details given by the client). Tungsten Network's Invoice Status Service is required for the facilitation of this rejection process.
- Tungsten Network will create a workflow image and deliver it to the client.

The following services Tungsten Network **will not** be available in Turkey:

- Tungsten Network will not do any Turkish supplier on-boarding or related services (unless and until clients are notified otherwise).
- The invoice submission functions referred to in 4.1.1 – 4.1.3 of the e-Invoicing Service Specification are not available for Turkish suppliers.
- PO services are not currently available for Turkish suppliers.
- Paper invoice conversion targets offered by Tungsten Network do not apply in Turkey as e-invoicing is already mandatory in this country.

The inclusion of Turkey in a client's scope (together with any necessary additional terms and pricing) must be separately agreed in writing between Tungsten Network and the client.

## 4.8. Registration with tax authorities

Clients that are located in certain countries are required to notify their local tax authority that they are using the Tungsten Network Archive. Details of the relevant countries, and a form of letter to be completed for the purpose of providing the notification, can be accessed via the following

link: [http://www.tungsten-network.com/Country/UK/Tax\\_Notifications](http://www.tungsten-network.com/Country/UK/Tax_Notifications)

## 5. Tungsten Network Geographic Scope

### 5.1. Tungsten Network e-Invoice Compliant Countries

Tungsten Network enables tax and regulatory compliant e-Invoicing in the following countries and territories.

- Australia, Austria, Belgium, Brazil, Bulgaria, Canada, Croatia, Czech Republic, Cyprus, Denmark, Estonia, Finland, France, Germany, Greece, Hong Kong, Hungary, Ireland, Italy, Latvia, Liechtenstein, Lithuania, Luxembourg, Malaysia, Malta, Mexico, Netherlands, New Zealand, Norway, Philippines, Poland, Portugal, Puerto Rico, Romania, Saudi Arabia, Singapore, Slovakia, Slovenia, South Africa, Spain, Sweden, Switzerland, Turkey, United Arab Emirates, United Kingdom and United States.

### 5.2. Tungsten Network Commercial Invoice Data Transfer Service Countries

Tungsten Network provides a Commercial Invoice Data Transfer Service in all other countries unless government embargo or other legal or local restrictions apply. The following are countries or territories where suppliers are enrolled with Tungsten Network.

- Afghanistan, Albania, Antigua, Argentina, Azerbaijan, Bahamas, Bahrain, Bangladesh, Barbados, Barbuda, Belarus, Belize, Bermuda, Bolivia, Bosnia and Herzegovina, Brazil, British Indian Ocean Territory, British Virgin Islands, Brunei, Darussalam, Cambodia, Cape Verde, Cayman Islands, Chile, China, Colombia, Congo, Costa Rica, Croatia, Cyprus, Djibouti, Dominica, Dominican Republic, Ecuador, Egypt, El Salvador, Faroe Islands, Fiji, French Polynesia, Georgia, Ghana, Gibraltar, Guatemala, Guyana, Haiti, Honduras, Iceland, India, Indonesia, Isle of Man, Israel, Jamaica, Japan, Jersey, Jordan, Kazakhstan, Kuwait, Lebanon, Lesotho, Macao, Macedonia, Maldives, Malta, Martinique, Mauritius, Moldavia, Monaco, Morocco, Myanmar, Nepal, Netherlands Antilles, Nicaragua, Nigeria, Norfolk Island, Oman, Pakistan, Panama, Paraguay, Peru, Qatar, Russia, Samoa, San Marino, Serbia and Montenegro, Seychelles, South Korea, Sri Lanka, Surinam, Swaziland, Taiwan, Thailand, Timor-Leste, Trinidad & Tobago, Tunisia, Turkey, Ukraine, Uruguay, US Virgin Islands, Uzbekistan, Venezuela, Vietnam and Zambia