

# Human T Cell Companion Kit

# **Product Description:**

The Intellicyt Human T Cell Companion Kits are used in combination with the Human T Cell Immunology portfolio of Kits. Human T Cell Companion Kits allow the measurement of human cytokines in addition to the cytokines already included in the Human T Cell Immunology Kits.



Part Number # 97028 IL-2 Part Number # 97029 IL-6 Part Number # 97030 IL-10 Part Number # 97031 IL-13 Part Number # 97032 IL-17A Part Number # 97033 GM-CSF Part Number # 97034 TNF

# **Components**

Detection Reagent (50x) – 90  $\mu$ L Capture Beads (50x) – 90  $\mu$ L Lyophilized Standard – 1 vial USB Flash Drive Containing: Analysis Template

## **Storage**

Store at 2-8°C

### Use

Use in combination with Intellicyt Human T Cell Immunology Kits. The Human T Cell Companion Kits contain the reagent volumes needed to run a 1 x 384-well format or 4 x 96-well format of the Human T Cell Immunology Kits. Additional Human T Cell Companion Kits are needed for use with 5 x 96-well format and 5 x 384-well format of the Human T Cell Immunology Kits.

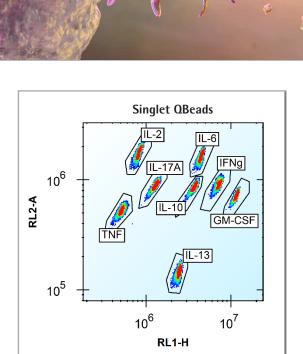


Figure 1: Human T Cell Companion Kit cytokine template.

# **Notes**

The templates from the specific Human T Cell Immunology Kits do not have the appropriate gating for the companion kit beads. Use the Human T Cell Companion Kit template (see Figure 1 for the full gating of all 8 cytokine beads). The Human T Cell Companion Kits can only be used in conjunction with the Intellicyt Human T Cell Immunology portfolio of Kits.

The Human T Cell Companion Kits contain the reagent volumes needed to run a 1 x 384-well format or 4 x 96-well format of Human T Cell Immunology Kits. Additional Human T Cell Companion Kits are needed for use with 5 x 96-well format and 5 x 384-well format of Human T Cell Immunology Kits.

#### Procedure

**1. Combine Standards** - Combine the Human T Cell Companion Kit standards with the standards in the Human T Cell Immunology Kit.

For example: the Human T Cell Activation Cell and Cytokine Profiling Kit provides 2 cytokine standards: IFN $\gamma$  and TNF $\alpha$ . If you purchased IL-2 and IL-6 Human T Cell Companion Kits, combine all 4 cytokine standards together in a single tube (IL-2, IL-6, IFN $\gamma$ , and TNF $\alpha$ ).

After combining all additional cytokine standards in a single tube, follow the protocol in the Human T Cell Immunology Kit protocol guide. Perform standard reconstitution and titration.

#### 2. Combine Human T Cell Companion Kit Capture Beads (50x)

- To the pre-mixed capture beads in the Human T Cell Immunology Kit, add the appropriate amount of Human T Cell Companion Kit capture beads to the kit vial.

Vortex the Human T Cell Companion Kit capture beads for 30 seconds. Use volumes listed in the tables below for your specific Human T Cell Immunology Kit type and configuration.

- 3. Combine Human T Cell Companion Kit Detection Reagent (50x) To the pre-mixed cytokine detection cocktail in the Human T Cell Immunology Kit, add the appropriate amount of detection reagent to the kit vial.

  Use volumes listed in the tables below for your specific Human T Cell Immunology Kit type and configuration.
- **4. Perform the Assay** Follow the protocol for your particular Human T Cell Immunology Kit and configuration.

#### Reagents Included in Human T Cell Activation Cell and Cytokine Profiling Kit

|   | 1 x 96-well      | 5 x 96-well      | 1 x 384-well     | 5 x 384-well       |
|---|------------------|------------------|------------------|--------------------|
| Human IFNγ and TNFα<br>Separate Standards (1 Vial Each) | 1 IFNγ<br>1 TNFα | 5 IFNγ<br>5 TNFα | 2 ΙΕΝγ<br>2 ΤΝΕα | 10 ΙΕΝγ<br>10 ΤΝΕγ |
| Human IFNγ and TNFα Capture Beads (pre-mixed)           | 1.25 mL          | 6.25 mL          | 2.50 mL          | 12.50 mL           |
| Cytokine Detection Cocktail                             | 1.25 mL          | 6.25 mL          | 2.50 mL          | 12.50 mL           |

#### For each Human T Cell Companion Kit cytokine, add volumes listed below to original kit components

|   | 1 x 96-well | 5 x 96-well  | 1 x 384-well | 5 x 384-well   |
|---|-------------|--|--------------|--|
| Human Cytokine Standard (vials)   | 1 standard  | Combine Human T Cell Companion Kit standard(s) with IFN $\gamma$ and TNF $\alpha$ Kit standards prepared fresh on each day of use. |              |  |
| Human T Cell Companion Kit Capture Beads (50x)  Add volume to the human IFNγ and TNFα Capture Beads (pre-mixed) | 25 μL       | Use volumes listed for each 1 x 96-well format and scale up as needed for # of plates/day  | 50 μL        | Use volumes listed<br>for each 1 x 384-well<br>format and scale up<br>as needed for # of<br>plates/day |
| Companion Detection Reagent (50x)  Add volume to the Cytokine Detection Cocktail                                | 25 μL       |  | 50 μL        |  |

Human T Cell Activation Cell and Cytokine Profiling Kit: fill amounts are for a full 96, or 384-well format.

Essen BioScience, A Sartorius Company 300 West Morgan Road Ann Arbor, Michigan, 48108 USA

www.sartorius.com Email: info@sartorius.com

USA +1.734.769.1600 UK +44.1707.358688 Japan +81.3.5826.4795

Doc Number: 17042

© 2019, Essen BioScience, Inc., part of the Sartorius Group. All Rights Reserved. Intellicyt®, iQue Screener PLUS®, ForeCyt®, MultiCyt®, OBead® and all names of Intellicyt products are registered trademarks and the property of Intellicyt in a Sartorius brand. Intellicyt is a Sartorius brand.

FOR RESEARCH USE ONLY. NOT FOR IN VITRO DIAGNOSTIC USE.