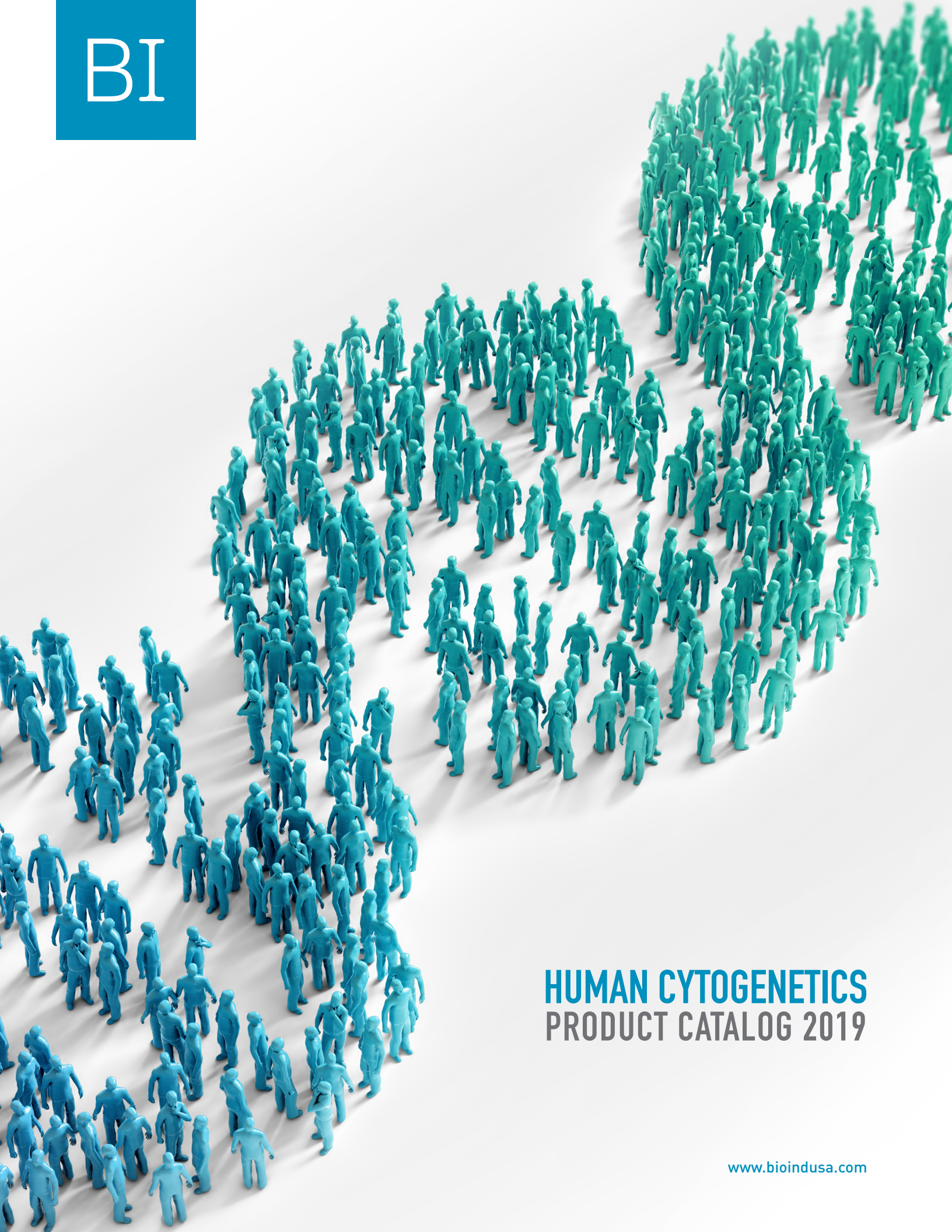


BI



# HUMAN CYTOGENETICS PRODUCT CATALOG 2019

[www.bioindusa.com](http://www.bioindusa.com)

# Biological Industries USA

With over 35 years of expertise in cell culture media development and manufacturing, Biological Industries' (BI) products—including BIO-AMF™, BIO-HEMATO™, and BIO-PB™ brands—are used in cytogenetic laboratories all around the world. With the 2015 launch of Biological Industries USA (BI-USA), you now have additional choices in selecting high quality tools that can help you make critical decisions in the lab. When your cytogenetics analysis is supported by the BI-USA team and BI media and supplements, you can be confident in the conclusions you reach.

Today, our product and services portfolio benefits both life science and medical customers. Whether it is in developing culture media for stem cell therapy, media to assist IVF procedures, or supplying classical cell culture media for molecular biology, we are committed to providing our customers with a *Culture of Excellence*. We do this through our advanced cGMP manufacturing and quality control systems, superior regulatory expertise, in-depth market knowledge, and extensive technical customer support, training, and R&D capabilities.



## BOOST PERFORMANCE INCREASE CONSISTENCY

### Performance

- Consistent lot-to-lot performance
- Optimized products for the analysis of amniotic fluid, chorionic villus, peripheral blood, bone marrow, and hematopoietic cells
- Delivers accelerated cell growth with high mitotic index and excellent chromosomal morphology
- Clean and reproducible results saving lab time with quick analysis and easy interpretation

### Quality Control

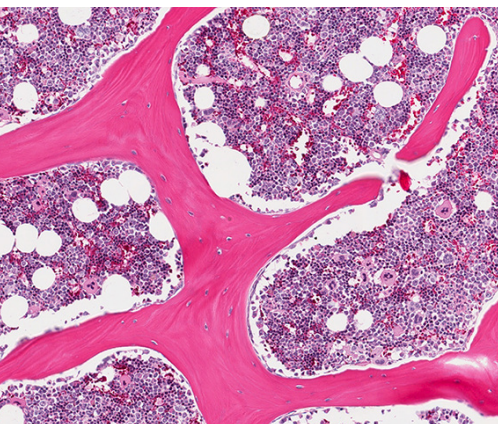
- Manufactured in compliance with the FDA's quality system regulation (cGMP) and the current requirements of ISO 9001 and ISO 13485
- Extensive QA testing for sterility, endotoxin, and adventitious agent

### Support

- Regional technical support
- Documentation and traceability documentation including Certificates of Analysis and Certificates of Origin
- Backed by more than 35 years of media development and manufacturing experience



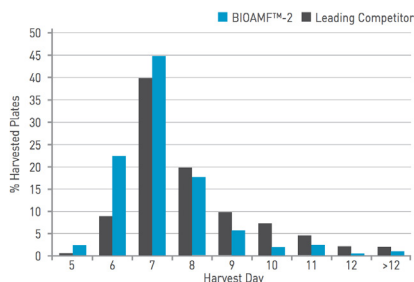
# AMNIOTIC FLUID AND CHORIONIC VILLUS CULTURE



## Optimized media for prenatal diagnostics

The BIO-AMF™ family of cytogenetic media are designed for primary culture of human amniotic fluid (AMF) cells and chorionic villi (CV) samples intended for karyotypic analysis. High mitotic index enables the accelerated growth of cells for rapid detection and enhanced analysis of chromosomal abnormalities. With BIO-AMF™ media, chromosome karyotyping time is greatly reduced, with significantly higher cell yield by Day 7 as compared to conventional media (Figure 1). The BIO-AMF™ media are easy to use and application-validated for cytogenetic analysis, giving reproducible results that are easy to analyze and interpret.

The enhanced buffering capacity of BIO-AMF™ media is ideal for AMF and CV cells cultured in both open (5% CO<sub>2</sub>) and closed systems. BIO-AMF™-2 is a ready-to-use complete media, requiring no serum or additional supplements.



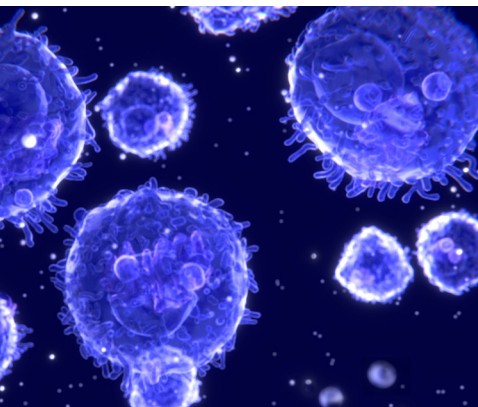
**Figure 1:** Comparison of the percentage of harvested plates according to harvest day between BIO-AMF™-2 and a leading competitor.

Data provided by Dr. Ayala Frumkin, Hadassah Medical Center, Israel.

	BIO-AMF™-1	BIO-AMF™-2
Open & Closed Systems	✓	✓
Cell Types	AMF and CVs	AMF and CVs
Advantages	Rapid growth of AMF and CV cells	- One bottle formulation - Ease-of-use
Complete Medium	No (L-Glutamine and antibiotics supplied separately)	Yes
Stability (when thawed)	14 days	7 days
Storage (when frozen)	- 15 months - 24 months	24 months

Description	Cat. #	Size
BIO-AMF™-1 Medium*	01-190-1B-KT	100 mL
BIO-AMF™-2 Medium	01-194-1A 01-194-1B	500 mL 100 mL

\* Includes basal medium and supplement mix.



## BONE MARROW CULTURE

### Optimized media for postnatal diagnostics

BIO-MARROW™ Karyotyping Medium is designed to stimulate the growth of both primary bone marrow cells and hematopoietic cells sourced from either bone marrow aspirate or peripheral blood.

BIO-HEMATO™ Karyotyping Medium is a ready-to-use and complete solution and has been found to be particularly effective in karyotyping leukemia, myelodysplastic syndrome, and polycythemia vera.

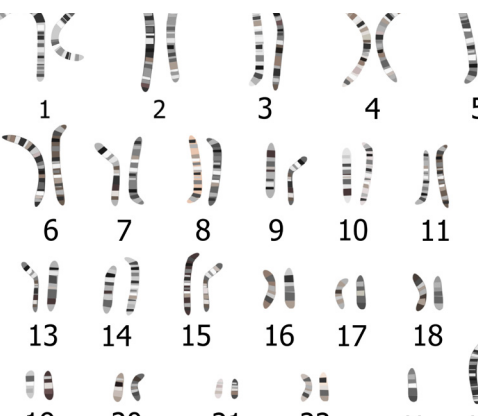
Description	Cat. #	Size
BIO-MARROW™ Karyotyping Medium without conditioned medium	01-199-1A	500 mL
	01-199-1B	100 mL
BIO-HEMATO™ Karyotyping Medium with conditioned medium	01-200-1A	500 mL
	01-200-1B	100 mL

## BLOOD LYMPHOCYTE CULTURE

### Optimized media for peripheral blood

BIO-PB™ Karyotyping Medium is specifically optimized for short-term culture of peripheral blood lymphocytes for chromosome analysis.

Description	Cat. #	Size
BIO-PB™ Karyotyping Medium, with PHA	01-201-1A	500 mL
	01-201-1B	100 mL



## KARYOTYPING REAGENTS

### Quality reagents for cytogenetic labs

BI-USA offers a complete range of products and reagents for your cytogenetic karyotyping needs from the start to finish, including colcemid, PHA, potassium chloride, and the BI Cell Synchronization Kit for high-resolution chromosomal studies.

Description	Cat. #	Size
Amphotericin B (10X) Solution	03-029-1B	100 mL
	03-029-1C	20 mL
Amphotericin B Solution	03-028-1B	100 mL
	03-028-1C	20 mL
Cell Synchronization Kit	12-008-60	60 Reactions
Colcemid (Demecolcine) Solution	12-004-1D	10 mL
Phytohemagglutinin-M (PHA-M), Liquid	12-009-1H	5 mL
Potassium Chloride (KCl), 0.075 Molar	12-005-1A	500 mL
	12-005-1B	100 mL
Sodium Citrate Solution	01-934-1A	500 mL
Trypsin (0.5%), EDTA (0.2%) (10X)	03-051-5B	100 mL
Trypsin Solution B (2.5%) (10X)	03-046-5B	100 mL



## FETAL BOVINE SERUM

All FBS reagents meet and exceed approved compliance validation specifications. Each batch of FBS is fully documented and traceable from the source of origin to final filtration, and is traceability certified by the International Serum Industry Association (ISIA).

Description	Cat. #	Size
Fetal Bovine Serum (FBS), US Origin	04-001-1A-US	500 mL
	04-001-1E-US	50 mL
Fetal Bovine Serum (FBS), US Origin, Heat-Inactivated	04-121-1A-US	500 mL
	04-121-1E-US	50 mL

## HUMAN PLATELET LYSATE

PLTGold® Human Platelet Lysate contains abundant amounts of growth factors and cytokines necessary for cell growth and proliferation. PLTGold® can be used as a replacement for FBS.

Description	Cat. #	Size
PLTGold® Human Platelet Lysate (Research Grade)	PLTGOLD27R	27 mL
	PLTGOLD100R	100 mL
	PLTGOLD500R	500 mL
PLTGold® Human Platelet Lysate (Clinical Grade)	PLTGOLD27GMP	27 mL
	PLTGOLD100GMP	100 mL
	PLTGOLD500GMP	500 mL

## RELATED PRODUCTS

Description	Cat. #	Size
EZ-PCR™ Mycoplasma Detection Kit	20-700-20	20 Assays
BIOMYC™-1 Antibiotic Solution	03-036-1B	100 mL
BIOMYC™-2 Antibiotic Solution	03-037-1B	100 mL
BIOMYC™-3 Antibiotic Solution	03-038-1B	100 mL
RPMI 1640 Medium	01-100-1A	500 mL
RPMI 1640 Medium, no glutamine, no glucose	01-101-1A	500 mL
RPMI 1640 Medium, no glutamine, no phenol red	01-103-1A	500 mL
RPMI 1640 Medium, no glutamine	01-104-1A	500 mL
RPMI 1640 Medium with HEPES	01-106-1A	500 mL
HBSS, calcium, magnesium	02-015-1A	500 mL
HBSS, no calcium, no magnesium	02-017-1A	500 mL
DPBS, no calcium, no magnesium	02-023-1A	500 mL
Gentamycin Sulfate Solution	03-035-1B	100 mL
Kanamycin Sulfate Solution	03-049-1B	100 mL
L-Glutamine Solution (200 mM)	03-020-1B	100 mL
MEM-alpha, no nucleosides, high glucose	01-043-1A	500 mL
Hepes Buffer Solution (1 M)	03-025-1B	100 mL
Penicillin-Streptomycin-Nystatin Solution	03-032-1B	100 mL
Penicillin-Streptomycin-Amphotericin B Solution	03-033-1B	100 mL
Water, Cell Culture Grade	03-055-1A	500 mL



Serum-free Media | Stem Cell Media | Optimizable Formulations  
Custom Manufacturing | Scientific and Regulatory Support | Scale-up Services

**Biological Industries USA | [orders@bioindusa.com](mailto:orders@bioindusa.com) | [www.bioindusa.com](http://www.bioindusa.com)**