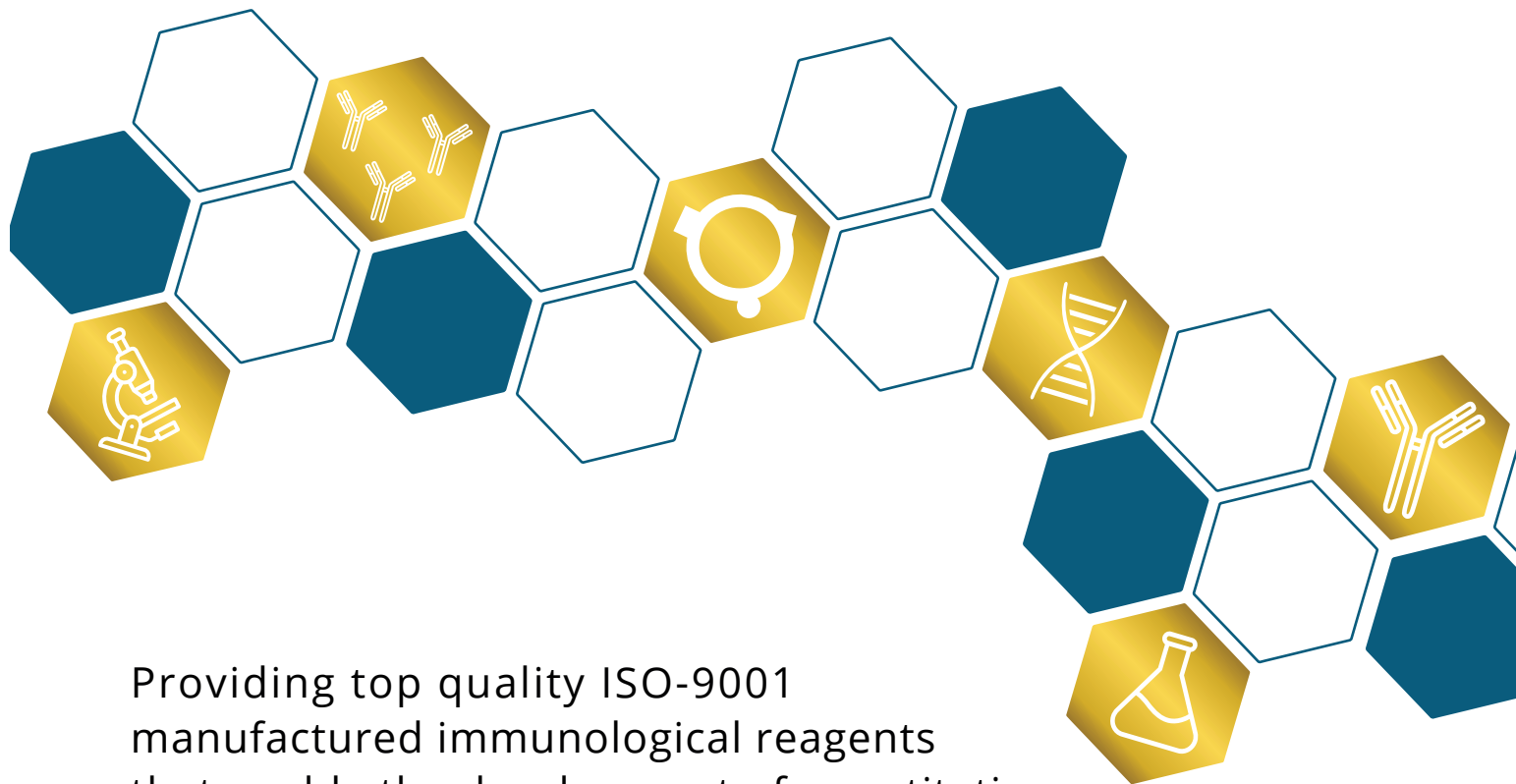




# **Advanced ImmunoChemical Inc.**

Providing Critical Raw Materials for the Advancement of Diagnostic Science



Providing top quality ISO-9001  
manufactured immunological reagents  
that enable the development of quantitative  
immunoassays for the detection of biomarkers  
to serious diseases, especially cardiac disease and  
diabetes to the global life sciences community.



**AdvImmuno.com**



# Advanced ImmunoChemical Inc.

Providing Critical Raw Materials for the Advancement of Diagnostic Science

Advanced ImmunoChemical is a small, woman-owned US bioscience corporation that supplies high quality immunological and biological reagents to the global life sciences research and diagnostic community.

Established in 1986, Advanced ImmunoChemical is recognized for offering critical top quality ISO-9001 manufactured immunological reagents to the global IVD research and academic communities. Today we provide products for several clinical areas, including diagnostic biomarkers for various serious diseases. *It is the educated and experienced handling of highly characterized immunological reagents that allows for the advancement of clinical diagnostic science and further drug discovery. This is our belief.*

DUNS: 806107140

CAGE CODE: 07GN4

NAICS CODE: 325413

## CERTIFICATIONS

ISO-9001:2015 Quality Management System

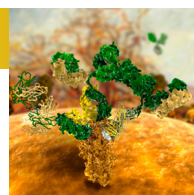
Woman-Owned Small Business



## KEY PRODUCTS

Immunological reagents for IVD

- Cardiac Markers
- Metabolic Syndrome
- Molecular Biology
- Tumor Markers
- Influenza A and B
- Veterinary
- Biodefense
- Kidney Disease
- Infectious Diseases
- Microbial and plant toxins



## CORE COMPETENCIES

Immunological reagents for In-vitro diagnostics and research.

Innovative paths to assay development and research:

Cardiac Disease / Metabolic Syndrome / Hormones / Tumor Markers / Neuroscience / Glycobiology / Blood Coagulation and Anemia / Inflammation / Infectious disease / Biodefense / Veterinary Diagnostics



## OUR CUSTOMERS INCLUDE



## DIFFERENTIATORS

- Continuous flow ISO-9001 certified new and existing products.
- Technical Support and Posted AssayNotes
- Online Store
- Uncompromising quality extends to full product range.



**Contact:** Anne Tolles, M.Sc., President

info@advimmuno.com | 844.840.4646

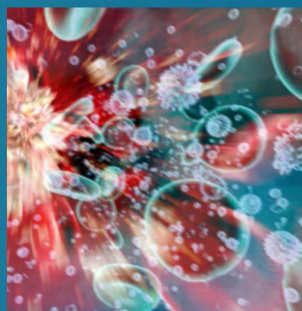
Advanced ImmunoChemical  
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Long Beach, CA 90802





# Advanced ImmunoChemical Inc.

Providing Critical Raw Materials for the Advancement of Diagnostic Science

## PRODUCT CATEGORIES/ Products by Clinical Area



Polyclonal Antibodies



Antigens



Molecular Biology



Monoclonal antibodies



Sera & Plasma



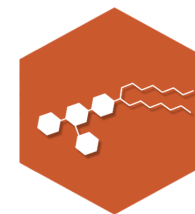
Biodefense



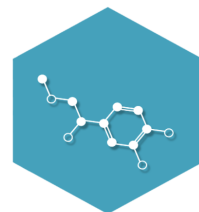
Blood Coagulation and Anemia



Cardiac Markers



Gangliosides



Hormones



Infectious Diseases



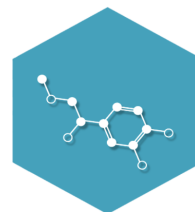
Inflammation



Kidney Diseases



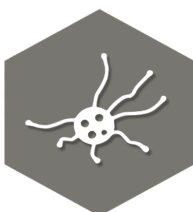
Metabolic Syndrome



Microbial & Plant Toxins



Neuroscience



Tumor Markers



Veterinary



**Advanced  
ImmunoChemical Inc.**

Providing Critical Raw Materials for the Advancement of Diagnostic Science



## Cardiac Markers

Cardiovascular diseases are a group of disorders that occur in the heart and blood vessels. They are the world's leading cause of death.

For over 20 years, Advanced ImmunoChemical has been at the forefront of providing critical reagents for cardiovascular diseases diagnostics.

We offer a broad panel of well-characterized antibodies and antigens, as well as analute depleted serum or plasma products that are suitable for immunoassay development on various platforms.

### Continuous investment in research

Cardiac marker research products have always been a key focus of interest at Advanced ImmunoChemical, including Troponin I, proBNP and its derivatives, PAPP-A and IGFBP-4. Our manufacturer's scientists have either authored or some 30 cardiac marker related articles published in peer reviewed scientific journals. This investment in scientific work has helped develop raw materials that are used by the world's leading diagnostics companies, as well as IFCC and AACC standardization committees.

- [AssayNotes](#)
- [Patents](#)
- [Articles](#)

#### NEW PRODUCTS

- [Human Lp-PLA2](#)
- [BNP MABs](#)



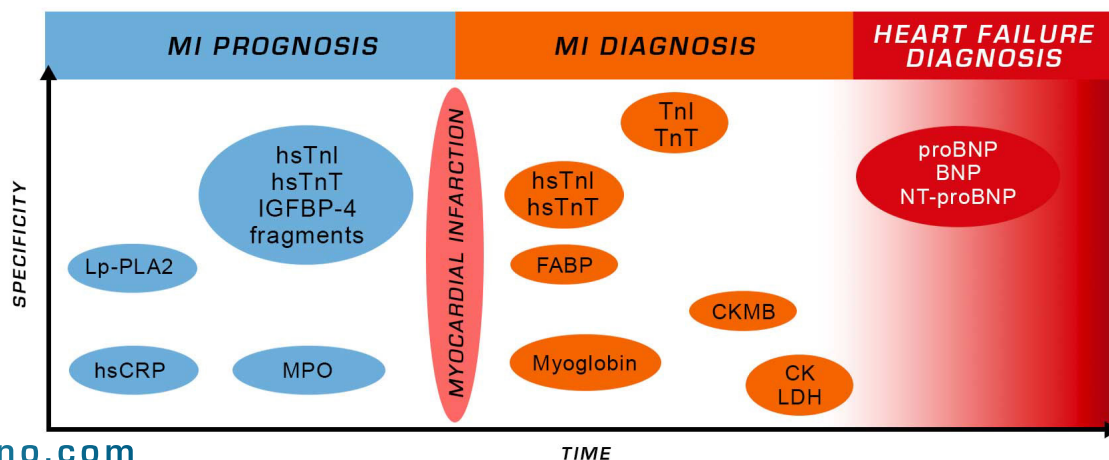
# Cardiac Markers, continued

## Cardiac troponin I

Cardiac troponin I is the gold standard biomarker for diagnosing myocardial infarction. Among numerous monoclonal antibodies developed against troponin I, we have carefully selected 35 for our catalog. We also provide other troponin I related products which include a wide selection of different purified troponin preparations - both native and recombinant. In 2004, our cardiac troponin complex material was chosen as a raw material for the international troponin standard.

## Cardiac Marker Products

- Monoclonal antibodies
- Polyclonal antibodies
- Antigens
- Plasma and sera





## Metabolic Syndrome

Metabolic Syndrome is a cluster of conditions that increases the likelihood of cardiovascular diseases and diabetes. Risk factors include abdominal obesity, elevated blood pressure, insulin resistance, high blood sugar levels, and abnormal blood cholesterol levels.

At Advanced ImmunoChemical, we provide monoclonal antibodies and antigens that enable the development of quantitative immunoassays for the detection of Metabolic Syndrome biomarkers such as adiponectin, insulin and glycated hemoglobin.

### Product Support Materials

- [Adiponectin AssayNotes](#)
- [HbA1c - The Glycated Isoform of Hemoglobin AssayNotes](#)
- [Rat C-peptide and Proinsulin AssayNotes](#)
- [Metabolic Syndrome Brochure](#)
- [Retinol-binding Protein 4 \(RBP4\) AssayNotes](#)
- [Biomarkers for R&D of Type 2 Diabetes and Cardiovascular Diseases](#)
- [Biomarkers of Diabetes: antigens and antibodies for the detection of HbA1C, C-peptide and insulin.](#)

### Metabolic Syndrome Products

- [Monoclonal antibodies](#)
- [Antigens](#)





## Infectious Diseases

In spite of the considerable progress made in diagnostics, therapy, and the prevention of infectious diseases, they remain the second highest cause of death in the world. Infectious diseases continue to be the primary cause of death in the developing countries.

At Advanced ImmunoChemical, we provide antibodies and antigens that enable the development of immunoassays for the detection of infectious diseases-causing pathogens. These include products for the detection of the influenza A and B viruses, adenovirus and salmonella, as well as viruses that cause sexually transmitted diseases and hepatitis B.

### Product Support Materials

- [Caliciviridae \(norovirus\) AssayNotes](#)
- [Influenza Virus Types A and B AssayNotes](#)
- [Human Papillomavirus \(HPV\) AssayNotes](#)

### Infectious Disease Products

- [Monoclonal Antibodies and Antigens](#)



## Veterinary Diagnostics

At Advanced ImmunoChemical we offer best-in-class veterinary diagnostics solutions based on scientifically developed products and a clear understanding of the needs of end-users.

In veterinary diagnostics the immunodiagnostic tests utilized are often based on assays that were originally developed for human diagnostics. Our goal is to offer species-specific raw materials that allow for the development of reliable and accurate immunoassays for animals.

Our antibody offering ranges from detecting infectious diseases causing viruses to cardiac markers and hormones. In addition to antibodies, we offer a selection of purified antigens - recombinant and/or native.

### Product Support Materials

- [Caliciviridae \(norovirus\) AssayNotes](#)
- [Canine TSH AssayNotes](#)
- [Canine NT-proBNP AssayNotes](#)
- [Canine CRP \(cCRP\) Assaynotes](#)

### Infectious Disease Products

- [Monoclonal Antibodies and Antigens](#)





## Catalog of Products 2018

### Antibodies and Antigens



#### **Cardiac Markers**

Troponin I (TnI)  
Troponin T (TnT)  
Troponin C (TnC)  
Myoglobin  
ProBNP, BNP and NT-proBNP  
Pregnancy-associated plasma protein-A (PAPP-A)  
Insulin-like growth factor binding protein 4 (IGFBP-4)  
Lipoprotein-associated phospholipase A2 (Lp-PLA2)  
Myeloperoxidase (MPO)  
Human serum albumin (HSA)  
Cystatin C  
Retinol-binding protein 4 (RBP4)  
Procalcitonin (PCT) and calcitonin  
Glycogen phosphorylase isoenzyme BB (GPBB)  
Fatty acid binding protein (FABP)  
D-dimer and high molecular weight fibrin degradation products  
Serum amyloid A (SAA)  
C-reactive protein (CRP)  
Soluble lectin-like oxidized LDL receptor (sLOX-1)  
Adiponectin (Adn)  
S100 protein  
Soluble CD40 ligand (sCD40L)



#### **Blood coagulation & Anemia**

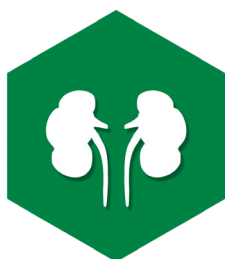
D-dimer  
Erythropoietin  
Ferritin  
Fibrinogen  
Fibrinopeptide A  
Folic acid  
Human serum albumin (HSA)  
Plasminogen  
Thrombin activatable fibrinolysis inhibitor (TAFI)  
Transferrin  
Transferrin receptor





## **Metabolic Syndrome**

Adiponectin  
C-peptide, human  
C-peptide, rat  
Ghrelin  
Hemoglobin, human, HbA10  
Hemoglobin, human, glycated, HbA1c  
Insulin-like growth factor binding protein 1 (IGFBP-1)  
Insulin  
Insulin/Proinsulin, rat-mouse  
Leptin  
Proinsulin, human  
Proinsulin, rat  
Retinol-binding protein 4 (RBP4)  
Soluble lectin-like oxidized LDL receptor (sLOX-1)

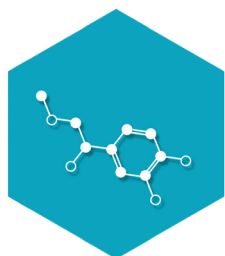


## **Kidney Diseases**

Cystatin C  
Human serum albumin (HSA)  
Kidney injury molecule-1 (KIM-1)  
Retinol-binding protein 4 (RBP4)

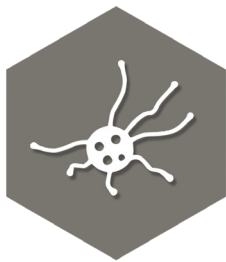
## **Fertility and Pregnancy**

Alpha-fetoprotein (AFP)  
Human chorionic gonadotropin (HCG)  
Insulin-like growth factor binding protein 1 (IGFBP-1)  
Mullerian inhibiting substance receptor (MISR)  
Pregnancy-associated plasma protein-A (htPAPP-A and dPAPP-A)



## **Hormones**

Calcitonin  
Cortisol  
Dopamine  
Erythropoetin  
Follicle stimulating hormone (FSH)  
17b-estradiol  
Growth hormone (hGH)  
Human chorionic gonadotropin (HCG)  
Insulin-like growth factor binding protein 1 (IGFBP-1)  
Lactoferrin  
Luteinizing hormone (LH)  
Progesterone  
Prolactin  
Testosterone  
Thyroid stimulating hormone (TSH)  
Thyroxine (T4)  
Triiodothyronine (T3)



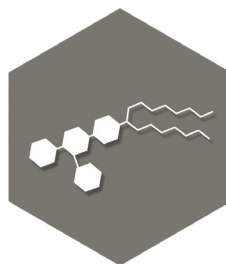
## **Tumor Markers**

Alpha-fetoprotein (AFP)  
Angiostatin  
CA-125  
CA15-3  
CA19-9  
CA72-4  
Carcinoembryonic antigen (CEA)  
CYFRA21-1  
Erythroblastic leukemia viral oncogene homolog 2 (Erb-2, HER2/neu)  
Human epididymis protein 4 (HE4)  
Human papillomavirus (HPV)  
Insulin-like growth factor binding protein 4 (IGFBP-4)  
Insulin-like growth factor binding protein 5 (IGFBP-5)  
Mucin-1 glycoprotein (MUC1)  
Neuron specific enolase (NSE)  
Non-neuronal enolase (NNE)  
Prostate-specific antigen (PSA)



## **Neuroscience**

Calmodulin  
Cu/Zn superoxide dismutase (Cu-Zn-SOD)  
Dopamine  
Glial fibrillary acidic protein (GFAP)  
Heat shock proteins (HSP)  
Myelin basic protein (MBP)  
Neuron specific enolase (NSE)  
Non-neuronal enolase (NNE)  
S100 protein



## **Gangliosides**

GM1, GM2, GM3, GM4, GD1a, GD1b, GD2, GD3,  
GQ1b, GT1a, GT1b, GD1a-NAcGal  
Ganglioside GM1 sphinganine  
Globoside

## **Immunology and Serology**

IgA, IgE, IgG, IgM  
Kappa and lambda chains  
Myeloperoxidase (MPO)  
Ovine IgG and IgM  
Thyroglobulin  
Thyroid peroxidase (TPO)



## **Inflammation**

Calcitonin  
C-reactive protein (CRP)  
Epidermal growth factor (EGF)  
Erythropoietin  
Interferons  
Interleukins  
Procalcitonin (PCT)  
Serum amyloid A (SAA)  
Tumor necrosis factor (TNF), alpha



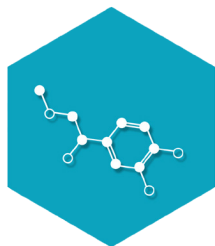
## **Infectious Diseases**

Influenza A and B  
*Mycobacterium tuberculosis*  
Other acute respiratory diseases (ARD)  
    *Adenovirus*  
    *Newcastle disease virus (NDV)*  
    *Parainfluenza*  
    *Respiratory syncytial virus (RSV)*  
Malaria  
Foodborne pathogens  
    *Adenovirus*  
    *Astrovirus*  
    *Caliciviridae (norovirus)*  
    *Campylobacter jejuni*  
    *Helicobacter pylori*  
    *Listeria monocytogenes*  
    *Rotavirus*  
    *Salmonella*  
TORCH  
    *Cytomegalovirus*  
    *Herpes simplex virus*  
    *Rubella virus*  
    *Toxoplasma gondii*  
Hepatitis  
Sexually transmitted diseases (STD)  
    *Candida albicans*  
    *Herpes simplex virus*  
    *Human papillomavirus*



## **Veterinary**

Adenovirus  
Astrovirus  
*Borrelia burgdorferi*  
Bovine corona virus  
Brucella abortus  
*Burkholderia mallei and pseudomallei*  
Calmodulin  
Canine CRP (cCRP)  
Canine distemper virus (CDV)  
Canine parvovirus (CPV)  
Cortisol  
Cystatin C  
Foot-and-mouth disease virus (FMDV)  
Glyceraldehyde 3-phosphate dehydrogenase (GAPDH)  
Infectious bronchitis virus (IBV)  
Infectious bursal disease virus (IBDV)  
Influenza A H5 and H7  
Insulin/Proinsulin  
Marek disease virus (MDV)  
Newcastle disease virus (NDV)  
NT-proBNP, canine  
Progesterone  
Proinsulin, rat  
Rabies virus  
Retinol-binding protein 4 (RBP4)  
Rotavirus  
S100  
Serum amyloid A (SAA)  
Thyroglobulin, canine  
Thyroid stimulating hormone (TSH)  
Thyroxine (T4)  
Transmissible gastroenteritis (TGE) virus of pigs  
Triiodothyronine (T3)  
Troponin I  
Troponin T



## **Microbial and Plant Toxins**

Aflatoxin  
Cholera toxin  
*Clostridium botulinum*  
Diphtheria toxin  
*E. coli* heat labile enterotoxin  
Microcystin-LR  
Ricin  
*Staphylococcus aureus* enterotoxins  
Tetanus toxin



## **Biodefense**

*Bacillus anthracis*  
Ebola virus  
*Francisella tularensis*  
Marburg virus  
Vaccinia virus  
*Yersinia pestis*

## **Miscellaneous**

Chloramphenicol  
Coxsackievirus B3  
Cyclosporin  
Egg white avidin  
Fibronectin  
FITC  
FK 560  
Galactosidase-b of E. coli  
Glyceraldehyde 3-phosphate dehydrogenase (GAPDH)  
Guanylate cyclase, human soluble (hsGC)  
His6-tag  
Horseradish peroxidase (HRP)  
Immunoreactive trypsin (IRT)  
Insulin-like growth factor binding protein 4 (IGFBP-4)  
Insulin-like growth factor binding protein 5 (IGFBP-5)  
Legionella pneumophila  
Osteocalcin  
Ovine IgG and IgM  
Proliferating cell nuclear antigen (PCNA)  
Streptavidin from *Streptomyces avidinii*  
Surfeit locus protein-6 (SURF-6)  
Western blot sets



## **Molecular Biology**

SmarTaq  
Taq Polymerase





## Product Articles

For Linked Articles, visit: [www.advimmuno.com/recent-product-articles](http://www.advimmuno.com/recent-product-articles)

### Troponin

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- Seferian KR, et al. (2007) The brain natriuretic peptide (BNP) precursor is the major immunoreactive form of BNP in patients with heart failure. *Clin. Chem.* 53, 866-873.
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## **Transferrin receptor**

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## **Adiponectin**

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## **D-dimer**

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