Gentium S.p.A.
Form 424B3
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PROSPECTUS

Gentium S.p.A.

300,000 American Depositary Shares
Representing 300,000 Ordinary Shares

The selling security holder identified in this prospectus is offering up to 300,000 American Depositary Shares ("ADSs"), each representing one ordinary share of our company, Gentium S.p.A. All of the ADSs are outstanding and issued to the selling security holder listed herein. Our ADSs are listed on the Nasdaq Global Market under the symbol "GENT." The lasted reported sale price for our ADSs on the Nasdaq Global Market on August 27, 2013 was $20.00 per ADS.

We will not receive any proceeds from the sale of ADSs by the selling security holder, F3F S.r.l. (formerly FinSirton S.p.A.). We are not offering any ADSs for sale under this prospectus. See "Selling Security Holder" on page 17 for a description of the selling security holder. See "Plan of Distribution" beginning on page 18 for a description of how the ADSs can be sold.

Our business and an investment in our ADSs involve significant risks. These risks are described under the caption "Risk Factors" beginning on page 5 of this prospectus.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

August 28, 2013

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ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement on Form F-3 that we filed with the Securities and Exchange Commission (or the SEC) using a "shelf registration" process. Under this process, F3F S.r.l. may, from time to time, sell the offered securities described in this prospectus in one or more offerings, up to a total of 300,000 ADSs.

This prospectus does not contain all of the information included in the registration statement and the exhibits thereto. This prospectus includes statements that summarize the contents of contracts and other documents that are filed as exhibits to the registration statement. These statements do not necessarily describe the full contents of such documents, and each such statement made in this prospectus or any prospectus supplement concerning any such documents filed as exhibits to the registration statement is qualified in its entirety by reference to that exhibit. You should refer to those documents for a complete description of these matters. It is important for you to read and consider all of the information contained in this prospectus and any applicable prospectus supplement before making a decision whether to invest in our ADSs. You should also read and consider the information contained in the documents that we have incorporated by reference as described below under the headings "Incorporation of Certain Information By Reference" and "Where You Can Find More Information" in this prospectus.

You should rely only on the information provided in this prospectus and any applicable prospectus supplement, including the information incorporated by reference. We have not authorized anyone to provide you with additional or different information. If anyone provides you with additional, different or inconsistent information, you should not rely on it. We are not offering to sell or soliciting offers to buy, and will not sell, any securities in any jurisdiction where it is unlawful. You should assume that the information contained in this prospectus or in any prospectus supplement, as well as information contained in a document that we have previously filed or in the future will file with the SEC and incorporate by reference in this prospectus or any prospectus supplement, is accurate only as of the date of this prospectus, the applicable prospectus supplement or the document containing that information, as the case may be. Our financial condition, results of operations, cash flows or business may have changed since that date.

We have not taken any action to permit a public offering of the ADSs outside the United States or to permit the possession or distribution of this prospectus outside the United States. Persons outside the United States who come into possession of this prospectus must inform themselves about and observe any restrictions relating to this offering of the ADSs and the distribution of the prospectus outside of the United States. See "Plan of Distribution."

PROSPECTUS SUMMARY

This prospectus summary highlights selected information contained elsewhere in this prospectus and the documents incorporated by reference. You should read the following information together with the more detailed information regarding our company and the ADSs being sold in this offering, with information appearing elsewhere in this prospectus and in selected portions of our Annual Report on Form 20-F for the year ended December 31, 2012 and other documents filed with the SEC that we have incorporated by reference into this prospectus.

Our Business

We are a biopharmaceutical company focused on the development and manufacture of our primary product candidate, defibrotide, an investigational drug based on a mixture of single- and double-stranded DNA extracted from pig intestines. Our development of defibrotide has been focused on the treatment and prevention of a disease called hepatic veno occlusive, or VOD, a condition that occurs when veins in the liver are blocked as a result of certain cancer treatments, such as chemotherapy or radiation, that are administered prior to stem cell transplantation. Severe VOD is the most extreme form of VOD and is linked to multiple-organ failure and high rates of morbidity and mortality.

Defibrotide for the treatment and prevention of VOD has been given "orphan" status by the U.S. Food and Drug Administration, or FDA, and the European Medicines Agency, or EMA, which means that we will have limited market exclusivity upon regulatory approval, if any. Defibrotide for the treatment and prevention of VOD has also been granted "orphan" status by the Korean Food and Drug Administration, or KFDA. In addition, defibrotide has also been granted "fast-track product" designation by the FDA for the treatment of severe VOD prior to stem cell transplantation. To the best of our knowledge, there are no FDA and EMA approved treatments for this life-threatening disease.

We have completed two clinical trials, a Phase III trial of defibrotide for the treatment of severe VOD in the U.S., Canada and Israel and a Phase II/III pediatric trial in Europe for the prevention of VOD. We also have an ongoing study for the treatment of hepatic VOD through our Investigational New Drug, or IND, protocol. While we have not yet obtained regulatory approval to market defibrotide, we are permitted to distribute defibrotide on a pre-approval basis throughout the U.S. pursuant to our IND protocol, which we refer to as our cost recovery program, and throughout the rest of the world on a named patient basis, which we refer to as our named-patient program. We expect to collect additional usage tolerability and safety data from patients of our cost recovery and named-patient programs to support our regulatory filings.

On May 10, 2011, we announced the filing of our Marketing Authorization Application, or MAA, under a centralized procedure with the EMA for defibrotide for the treatment and prevention of VOD in adults and children. On March 21, 2013, the EMA's Committee for Medicinal Products for Human Use, or CHMP, expressed a negative opinion for the approval of our MAA. On June 4, 2013, we requested a re-examination of the negative opinion given by the EMA's CHMP regarding the MAA for defibrotide. On July 26, 2013, the EMA's CHMP adopted a positive opinion, recommending a marketing authorization for defibrotide, under exceptional circumstances, for the treatment of severe hepatic veno-occlusive disease in patients undergoing hematopoietic stem cell transplantation therapy. The European Commission, or EC, will review the positive recommendation from the CHMP, and make a final decision on granting the marketing authorization. When the EC grants the marketing authorization for defibrotide, under exceptional circumstances, for the treatment of severe hepatic veno-occlusive disease in patients undergoing hematopoietic stem cell transplantation therapy, the marketing authorization will be subject to a requirement that we introduce specific procedures and fulfill certain obligations, particularly relating to the safety of defibrotide until the marketing authorization is converted into one without exceptional circumstances. Defibrotide will be commercialized under the brand name DEFITELIO® upon regulatory approval.

On July 6, 2011, we announced the filing of our new drug application, or NDA, with the FDA for defibrotide for the treatment of hepatic VOD in adults and children undergoing hematopoietic stem-cell transplantation. On August 17, 2011, we announced our voluntary withdrawal of our NDA following correspondence from the FDA identifying several potential "Refuse to File" issues regarding, among other things, the completeness and accuracy of our datasets. We have been working with contract research organizations, or CROs, and consultants to address the issues raised by the FDA and plan to resubmit our NDA in 2013.

We have entered into a license and supply agreement with Sigma-Tau Pharmaceuticals, Inc., or Sigma-Tau (as assignee of Sigma-Tau Industrie Farmaceutiche Riunite S.p.A.) to commercialize defibrotide for the treatment and prevention of VOD in North America, Central America and South America (collectively, the "Americas") upon FDA approval, if any. Pursuant to the terms of this license agreement, between 2001 and 2010, we received US$ 11.35 million in milestone payments. We are entitled to an additional payment of US$ 6.0 million following regulatory approval from the FDA to market defibrotide in the U.S., and a further US$ 2.0 million payment following the transfer of the approved NDA to Sigma-Tau. In addition, in connection with such agreement, Sigma-Tau has agreed to reimburse us with certain costs associated with the development of defibrotide. We continue to work with Sigma-Tau on our U.S. regulatory strategy.

On July 3, 2013, we entered into an agreement with EG S.p.A., a subsidiary of the Stada Group, whereby we agreed to (i) sell the Italian marketing authorization for Genkinase and (ii) supply EG S.p.A. and Crinos S.p.A., another subsidiary of the Stada Group, urokinase (the active pharmaceutical ingredient of Genkinase) for a period of five years. In connection with this agreement, Crinos S.p.A. has agreed to waive its right to royalty payments equal to 1.5% of the net sales of defibrotide in Europe for seven years following our receipt of a marketing authorization for defibrotide from the European Medicines Agency, the rights of which Crinos S.p.A. had previously acquired pursuant to an agreement with us in 2006.

In August 2011, we formed a wholly-owned subsidiary, Gentium GmbH, organized under the laws of Switzerland, as headquarters for our commercial operations, and, in 2012, we assigned our rights to distribute defibrotide worldwide, except for the Americas, to Gentium GmbH. Gentium GmbH is currently a party to several license and/or supply and distribution agreements with specialized regional partners to distribute defibrotide, including on a named-patient basis, in the following territories: the Asian Pacific, the Middle East and North Africa, Europe, the Nordics and Baltics, Turkey, Israel and the Palestinian Authority. Certain of these regional partners have also agreed to assist us with local registration, marketing authorization, reimbursement, marketing, sales and distribution and medical affairs activities following regulatory approval, if any. Through Gentium GmbH, we plan to distribute defibrotide in major European countries upon regulatory approval, if any, on our own.

We have a manufacturing plant in Italy where we produce active pharmaceutical ingredients, or APIs, such as the defibrotide compound, urokinase, sodium heparin and sulglicotide. These APIs are subsequently used to make the finished forms of various drugs. With respect to defibrotide, we have contracted with Patheon S.p.A. to process the defibrotide drug substance into its finished form, the defibrotide drug product, at Patheon's manufacturing facility. We believe that we are the sole worldwide producer of defibrotide. Our operating assets are located in Italy.

We operate in a highly regulated and competitive environment. The manufacturing and marketing of pharmaceutical products require approval of, and are subject to ongoing oversight by, the FDA, in the United States, the EMA, in the EU, and comparable agencies in other countries. Obtaining approval for a new therapeutic product is never certain, may take many years and may involve the expenditure of substantial resources. We are subject to a number of risks, including our ability to successfully obtain regulatory approval for defibrotide, the uncertainty that defibrotide will become a successful commercial product, our ability to generate projected revenue through our named-patient and cost recovery programs, our dependence on corporate partners, our ability to obtain financing, if necessary, and potential changes in the health care industry. Before making an investment decision, you should carefully consider the risks described under "Risk Factors" in this prospectus or any updates in our reports on Form 6-K, together with all of the other information appearing in this prospectus or incorporated by reference into this prospectus and any applicable prospectus supplement, in light of your particular investment objectives and financial circumstances. The risks so described are not the only risks facing us. Additional risks not presently known to us or that we currently deem immaterial may also impair our business operations. Our business, financial condition and results of operations could be materially adversely affected by any of these risks. The trading price of our securities could decline due to any of these risks, and you may lose all or part of your investment. The discussion of risks includes or refers to forward-looking statements; you should read the explanation of the qualifications and limitations on such forward-looking statements discussed elsewhere in this prospectus.

Corporate Information and Executive Offices

We started as a group of pharmaceutical businesses founded in Italy in 1944 and have been involved in the research and development of drugs derived from DNA and DNA molecules since the 1970s. In 1993, we were formed by F3F S.r.l. (formerly known as FinSirton S.p.A.) as Pharma Research S.r.l., an Italian private limited company, for the purpose of pursuing research and development activities of prospective pharmaceutical specialty products. In July 2001, we changed our name to Gentium S.p.A. F3F S.r.l. is one of our largest shareholders owning approximately 17% of our outstanding ordinary shares at December 31, 2012, and may be deemed to be controlled by Dr. Laura Ferro, our former Chief Executive Officer and President and currently one of our directors, and her family. Under our current bylaws, our company's term of existence will expire on December 31, 2050. We are governed by the Italian Civil Code.

Our principal executive offices are located at Piazza XX Settembre 2, 22079 Villa Guardia (Como), Italy. Our telephone number is +39 031 5373200. Our website is located at www.gentium.it. The information contained on our website is not part of this prospectus. Our registered agent for service of process is CT Corporation System, located at 111 Eighth Avenue, 13th Floor, New York, New York 10011, telephone number (212) 894-8940.

This prospectus may contain market data and industry forecasts that were obtained from industry publications.

RISK FACTORS

You should carefully consider the risks described below, in conjunction with the other information and financial statements and related notes included elsewhere in this prospectus, before making an investment decision. You should pay particular attention to the fact that we conduct our operations in Italy and are governed by a legal and regulatory environment that in some respects differs significantly from the environment that prevails in other countries with which you may be familiar. Our business, financial condition or results of operations could be affected materially and adversely by any or all of these risks. In that event, the market price of our ADS could decline and you could lose all or part of your investment.

Risks Relating to Our Business

We do not currently have any regulatory approvals to sell defibrotide to treat or prevent VOD, and we cannot guarantee that we will be able to commercialize defibrotide to treat or prevent VOD anywhere in the world.

Obtaining regulatory approval has been and continues to be increasingly difficult and costly and takes many years, and, once obtained, is costly to maintain. With the occurrence of a number of high profile safety events with certain pharmaceutical products, regulatory authorities, and in particular the FDA, members of Congress, the United States Government Accountability Office (GAO), Congressional committees, private health/science foundations and organizations, medical professionals, including physicians and investigators, and the general public are increasingly concerned about potential or perceived safety issues associated with pharmaceutical and biological products, whether under study for initial approval or already marketed.

This increasing concern has produced greater scrutiny, which may lead to fewer treatments being approved by the FDA or other regulatory bodies, as well as more restrictive labeling of a product or a class of products for safety reasons, potentially including a boxed warning or additional limitations on the use of products, pharmacovigilance programs for approved products or requirement of risk management activities related to the promotion and sale of a product.

On May 10, 2011, we announced the filing of our Marketing Authorization Application, or MAA, under a centralized procedure with the EMA for defibrotide for the treatment and prevention of VOD in adults and children. On March 21, 2013, the EMA's Committee for Medicinal Products for Human Use, or CHMP, expressed a negative opinion for the approval of our MAA. On June 4, 2013, we requested a re-examination of the negative opinion given by the EMA's CHMP regarding the MAA for defibrotide. On July 26, 2013, the EMA's CHMP adopted a positive opinion, recommending a marketing authorization for defibrotide, under exceptional circumstances, for the treatment of severe hepatic veno-occlusive disease in patients undergoing hematopoietic stem cell transplantation therapy. The European Commission, or EC, will review the positive recommendation from the CHMP, and make a final decision on granting the marketing authorization. When the EC grants the marketing authorization for defibrotide, under exceptional circumstances, for the treatment of severe hepatic veno-occlusive disease in patients undergoing hematopoietic stem cell transplantation therapy, the marketing authorization will be subject to a requirement that we introduce specific procedures and fulfill certain obligations, particularly relating to the safety of defibrotide until the marketing authorization is converted into one without exceptional circumstances. Defibrotide will be commercialized under the brand name DEFITELIO® upon regulatory approval.

On July 6, 2011, we announced the filing of our new drug application, or NDA, with the FDA for defibrotide for the treatment of hepatic VOD in adults and children undergoing hematopoietic stem-cell transplantation. On August 17, 2011, we announced our voluntary withdrawal of our NDA following correspondence from the FDA identifying several potential "Refuse to File" issues regarding, among other things, the completeness and accuracy of our datasets. We have been working with contract research organizations, or CROs, and consultants to address the issues raised by the FDA and plan to resubmit our NDA in 2013.

Although we believe that we will obtain regulatory approval from EMA to market and sell defibrotide, under exceptional circumstances for the treatment of severe VOD, we may not obtain regulatory approval to market and sell defibrotide in other markets for the prevention or treatment of VOD, and in Europe for the prevention of VOD. If we are unable to obtain regulatory approval to commercialize defibrotide from the FDA and EMA for both the prevention and treatment of VOD, our business and results of operations could be materially and adversely affected and we may be unable to continue as a going concern.

The FDA and EMA may require us to conduct additional clinical trials for defibrotide to treat VOD or prevent VOD and/or collect additional data, which will delay the commercialization of defibrotide and may require us to obtain additional capital.

Although we believe that EMA will grant us a marketing authorization under exceptional circumstances for defibrotide for the treatment of severe VOD, both the EMA and the FDA may require us to conduct one or more additional clinical trials prior to granting marketing approval for defibrotide for the prevention of VOD, and the FDA may require us to collect additional data prior to granting marketing approval for defibrotide for the treatment of the VOD in the United States.

Conducting clinical trials is a complex, time-consuming and expensive process. Our ability to complete any clinical trials in a timely fashion will depend in large part on a number of key factors, including protocol design, regulatory and institutional review board approval, the rate of patient enrollment in clinical trials, and compliance with extensive current Good Clinical Practices requirements. We have opened clinical sites and have enrolled patients in a number of new countries where our experience is more limited, and have required the use of the services of third party clinical trial service providers. If we fail to adequately manage the design, execution and regulatory aspects of any new clinical trials, our studies and ultimately our regulatory approvals may be delayed or we may fail to gain approval for our product candidates altogether. In addition, collecting additional data for the treatment study may be difficult, since we use a historical control arm for that study and we have not been able to enroll a large number of patients.

We may lack sufficient capital to commence and complete new clinical studies for defibrotide. Obtaining additional capital through equity and/or debt financings, loans or collaborative arrangements with corporate partners may not be available to us on favorable terms, if at all. Even if we are able to obtain additional capital to conduct additional clinical trials for defibrotide, these studies may take years to complete.

While we have generated limited revenue from sales of defibrotide on a pre-approval basis, we have had significant losses to date, and we may not be able to meet our future cash requirements without obtaining additional capital from external sources or if we are prevented from or unsuccessful in distributing defibrotide.

As of June 30, 2013, we had approximately €16.15 million in cash and cash equivalents. We have generated a significant portion of our revenue through the distribution of defibrotide on a pre-approval basis through our cost recovery and named-patient programs. Prior to the initiation of our cost recovery and named-patient programs, we were cash-flow negative and had only generated net losses. We may revert to incurring significant losses and may become cash-flow negative, particularly if we are required to conduct additional clinical studies, or if we are prevented from or unsuccessful in distributing defibrotide. If we incur operating losses and become cash-flow negative for longer than we expect to and are unable to raise additional capital, we may become insolvent and unable to continue our operations. In addition, our fluctuating operating results may fail to meet the expectations of investors, which may cause the price of our ADSs to decline.

Our failure to raise additional funds in the future may delay the development of defibrotide.

The development of defibrotide has required a commitment of substantial funds and we may need to commit a substantial amount of additional funds in order to obtain regulatory approval to market and commercialize defibrotide.

Our long-term capital requirements are dependent upon many factors, some of which are beyond our control, including:

- the timing and cost to develop and obtain regulatory approvals to market defibrotide, including the potential need to conduct future clinical trials or collect additional data;
- future payments, if any, received or made under existing or possible future collaborative arrangements;
- our ability to continue to distribute defibrotide under our named-patient and cost recovery programs;
- the costs associated with building and maintaining a commercial infrastructure;
- the costs associated with implementing any upgrades to our manufacturing facility as required by the FDA, the EMA, or any other regulatory body;
- the costs associated with protecting and expanding our patent and other intellectual property rights;
- market acceptance of defibrotide; and
- the overall condition of the financial markets.

We cannot assure you that funds will be available to us in the future on favorable terms, if at all. If adequate funds are not available to us on terms that we find acceptable, or at all, we may be required to delay, reduce the scope of, or eliminate research and development efforts with respect to defibrotide. We may also be forced to curtail, cease or restructure our operations, enter into new funding arrangements with collaborators on unattractive terms, or relinquish rights to defibrotide that we would not otherwise relinquish in order to continue operating independently.

Even if we obtain regulatory approval to market defibrotide, we do not know whether we will ever generate significant revenues.

Even if we are successful in obtaining regulatory approval to market defibrotide, we may have very limited markets and may not generate enough revenues from defibrotide to fund our business. The FDA, EMA and KFDA have designated defibrotide to treat and prevent VOD, as "orphan drugs," which generally means that fewer than 200,000 people are affected by the disease or condition. If we are unable to distribute defibrotide at our expected price-points to this limited market, we may never generate significant revenue.

Following regulatory approval for defibrotide, if any, we plan on marketing and distributing defibrotide in major countries throughout Europe through our subsidiary, Gentium GmbH. However, we have alliances with regional partners to assist us with the distribution of defibrotide in certain territories post-approval, including an alliance with Sigma-Tau Pharmaceuticals, Inc. to market defibrotide for the treatment and prevention of VOD in North America, Central America and South America. Our future profitability may depend largely on our partners' efforts to market defibrotide, which may not be successful.

If we fail to comply with the extensive legal and regulatory requirements affecting the health care industry, we could face increased costs and penalties.

Our activities, and the activities of our collaborators and third-party providers, are subject to extensive government regulation and oversight both in the U.S. and in foreign jurisdictions. The FDA and comparable agencies in other jurisdictions directly regulate many of our most critical business activities, including the conduct of preclinical and clinical studies, product manufacturing, advertising and promotion, product distribution, adverse event reporting and product risk management. These risks may be heightened if we obtain regulatory approval for defibrotide.

Regulations governing the health care industry are subject to change, including:

- new laws, regulations or judicial decisions, or new interpretations of existing laws, regulations or decisions, related to health care availability, pricing or marketing practices, compliance with wage and hour laws and other employment practices, method of delivery, payment for health care products and services, tracking payments and other transfers of value made to physicians and teaching hospitals, and extensive anti-bribery and anti-corruption prohibitions;

- changes in the FDA and foreign regulatory approval processes that may delay or prevent the approval of new products and result in lost market opportunity;

- changes in FDA and foreign regulations that may require additional safety monitoring, labeling changes, restrictions on product distribution or use, or other measures after the introduction of our products to market, which could increase our costs of doing business, adversely affect the future permitted uses of approved products, or otherwise adversely affect the market for our products; and

- changes in the tax laws relating to our operations.

We may be required to suspend or discontinue any current and future clinical trials due to adverse events or other safety issues which could preclude approval of defibrotide and negatively affect our business model and stock price.

If we are required to conduct any future clinical trials for defibrotide, the trials may be suspended at any time for a number of safety-related reasons. For example, we may voluntarily suspend or terminate such clinical trials if, at any time, we believe that defibrotide presents an unacceptable risk to the clinical trial patients. In addition, institutional review boards or regulatory agencies may order the temporary or permanent discontinuation of our clinical trials at any time if they believe that the clinical trials are not being conducted in accordance with applicable regulatory requirements, including if they present an unacceptable safety risk to patients.

Administering any product candidate to humans may produce undesirable side effects. VOD is a condition associated with high dose chemotherapy and stem cell transplantation. Adverse events involving vascular disorders, coagulation and potentially life-threatening bleeding have been reported in VOD patients treated with defibrotide, which could potentially be related to the defibrotide therapy. Hypotension has been reported in patients participating in clinical trials of defibrotide to treat severe VOD, which may also be related to the drug. Also, we discontinued a 69-patient Phase I/II clinical trial of defibrotide to prevent deep vein thrombosis after hip surgery in Denmark in 2002, when three patients experienced hypotension after receiving the defibrotide intravenously. That trial was discontinued due to the hypotension and because defibrotide can also be administered orally to prevent deep vein thrombosis. These adverse events reports will be assessed by the FDA and other regulatory authorities in determining whether defibrotide is, from a risk-benefit perspective, safe and effective to treat severe VOD, to prevent VOD, and to prevent deep vein thrombosis.

It is possible that new adverse events or safety issues will emerge from future data, which could impact conclusions relating to the safety of defibrotide. Any complications associated with the use of defibrotide would severely harm our business operations.

Product liability and other claims arising out of the testing of our product candidates in human clinical trials may reduce demand for our products or result in substantial damages.

We face an inherent risk of product liability exposure in connection with human clinical trial testing of defibrotide and the distribution of defibrotide through our named-patient and cost recovery programs. An individual may bring a product liability claim against us if defibrotide causes, or merely appears to have caused, an injury.

Product liability claims of this nature may result in:

- a decreased demand for defibrotide;
- injury to our reputation;
- withdrawal of clinical trial volunteers;
- significant litigation costs; and
- substantial monetary awards to plaintiffs.

Although we currently maintain product liability insurance, we may not have sufficient insurance coverage, and we may not be able to obtain sufficient coverage at a reasonable cost. Our inability to obtain product liability insurance at an acceptable cost or to otherwise protect against potential product liability claims could prevent or inhibit the commercialization of any products that we or our collaborators develop, including defibrotide. If we are successfully sued for any injury caused by our products or processes, then our liability could exceed our product liability insurance coverage and our total assets.

Defibrotide could be subject to restrictions or withdrawal from the market and we may be subject to penalties if we fail to comply with regulatory requirements, if and when defibrotide is approved.

Any product for which we obtain marketing approval, together with the manufacturing processes, post-approval commitments, and advertising and promotional activities for such product, will be subject to continued regulation by the FDA and other regulatory agencies. Later discovery of previously unknown problems with defibrotide or its manufacture, or failure to comply with regulatory requirements, may result in:

- restrictions on defibrotide or manufacturing processes;
- withdrawal of defibrotide from the market;
- voluntary or mandatory recalls;
- fines;
- suspension of regulatory approvals;
- product seizures; or
- injunctions or the imposition of civil or criminal penalties.

If we are slow or unable to adapt to changes in existing regulatory requirements or the adoption of new regulatory requirements or policies, we may lose marketing approval for defibrotide when and if defibrotide is approved.

Our manufacturing facility and the manufacturing facility of Patheon S.p.A., with whom we have contracted to fill and finish defibrotide, are subject to continuing regulation by Italian authorities and are subject to inspection and regulation by the FDA and the EMA. These authorities could force us to stop manufacturing our products if they determine that we or Patheon are not in compliance with applicable regulations or require us to complete further costly alterations to our facilities.

We manufacture our APIs at our manufacturing facility in Italy. In addition, we have hired Patheon S.p.A. to process defibrotide into the finished drug at Patheon's manufacturing facility. These facilities are subject to continuing regulation by the Italian Health Authority and other Italian regulatory authorities with respect to the manufacturing of APIs, including the defibrotide API or its finished form. These facilities are also subject to inspection and regulation by the FDA and the EMA with respect to the manufacturing of the defibrotide API and its finished form. Also, part of the process to obtain FDA and EMA approval for defibrotide is to obtain certification from those authorities that these facilities are in compliance with current good manufacturing practices. Following initial approval, if any, the FDA or the EMA will continue to inspect our manufacturing facilities, in some cases, unannounced, to confirm ongoing compliance with good manufacturing practices.

These regulators may deny approval to manufacture our APIs or otherwise require us to stop manufacturing our APIs if they determine that either our facility or Patheon's facility does not meet the standards of compliance required under applicable regulations. In addition, these regulators may require us to complete costly alterations to our facilities.

The Public Company Accounting Oversight Board is unable to enforce its review of the audits conducted by our independent registered public accounting firm operating in Italy; therefore, investors may be deprived of the benefits of such inspection.

Our independent registered public accounting firm, Reconta Ernst and Young S.p.A., that issues the audit reports included in our annual reports filed with the SEC, is required by the laws of the United States to undergo regular inspections by the Public Company Accounting Oversight Board, or PCAOB, to assess its compliance with SEC rules and PCAOB professional standards. While our audits are performed in accordance with the standards of PCAOB, our auditors are a registered public accounting firm in Italy, a jurisdiction where the PCAOB is currently unable, under Italian law, to enforce their inspection of our auditors audits and, therefore, our auditors, like other independent registered public accounting firms in Italy, are currently not inspected by the PCAOB.

Inspections of audit firms that the PCAOB has conducted have identified deficiencies in those firms' audit procedures and quality control procedures, which may be addressed as part of the inspection process to improve future audit quality. The lack of PCAOB inspections in Italy prevents the PCAOB from regularly evaluating our auditor's audits and quality control procedures. As a result, the inability of the PCAOB to conduct inspections of auditors in Italy may deprive investors of the benefits of PCAOB inspections.

We currently rely upon a sole processor, Patheon S.p.A., to fill and finish defibrotide into marketable formulations, and we may not be able to quickly replace Patheon if it is unable to perform these services.

If Patheon does not or is not able to perform these services for any reason, it may take time and resources to implement and execute the necessary technology transfer to another processor, and such a delay could potentially cause us to breach contractual obligations into which we have entered or may enter, violate local laws requiring us to deliver the product to those in need, and impact our revenues.

We use hazardous materials in our manufacturing facility, and any claims relating to the improper handling, storage, release or disposal of these materials could be time-consuming and expensive.

Our manufacturing of active pharmaceutical ingredients involves the controlled storage, use and disposal of chemicals and solvents. We are subject to laws and regulations governing the use, transportation, treatment, storage, handling and disposal of solid and hazardous materials, wastewater discharges and air emissions. We obtained certification under the UNI EN ISO 14001 Standard for our environmental management system on April 20, 2007 and an Eco-management and Audit Scheme, or EMAS, certification on July 26, 2007. Both certifications were renewed in 2013 for an additional three-year period. Our environmental policy is designed to comply with current regulations on environmental protection, to provide for continuous improvement of our manufacturing performance, to protect our employees' health, to protect the safety of people working at our location and to respect the safety of people living close to our plant and in the surrounding community. Although we believe that our safety procedures for handling and disposing of these hazardous materials comply with the standards prescribed by these laws and regulations, we cannot completely eliminate the risk of contamination or injury from hazardous materials. If an accident occurs, an injured party could seek to hold us liable for any damages that result and any liability could exceed the limits or fall outside the coverage of our insurance. We may not be able to maintain insurance on acceptable terms, or at all. We may incur significant costs to comply with current or future environmental laws and regulations.

We may have difficulty obtaining raw material for defibrotide.

Defibrotide is based on pig intestines. If our current sources of pig intestines encounter safety or other issues that impact their ability to supply the pig intestines to us as needed, we may not be able to find alternative suppliers in a timely fashion. In that case, we would have to slow or cease our manufacture of defibrotide.

Due to our limited resources, we rely on third parties for the development of defibrotide and, if these third parties fail to comply with strict regulations, the development of defibrotide may be delayed or unsuccessful.

We do not have the personnel capacity to manage all aspects concerning the development of defibrotide. We depend on third-party providers to manage our clinical trials and will likely continue to depend on such third parties with respect to any future clinical trials conducted. If these third parties fail to comply with applicable regulations or if they fail to adequately execute such trials and/or manage or studies, we may not be able to enter into alternative arrangements without undue delay or additional expenditures and, as a result, the development of defibrotide may be delayed or we may fail to gain regulatory approval altogether.

If we are unable to attract and retain qualified personnel and key relationships, our business could be seriously harmed.

We are highly dependent on our senior management, whose services are critical to the successful implementation of research and development and manufacturing and regulatory strategies, and our ability to maintain relationships with key opinion leaders. If we lose one or more of the members of our senior management or other key opinion leaders, our business could be seriously harmed.

Replacing key employees may be difficult and may take an extended period of time because of the limited number of individuals in our industry with the breadth of specific skills and experience required to develop, obtain regulatory approval for and commercialize defibrotide. Competition to hire from this limited pool is intense, and we may be unable to hire, train, retain or motivate these additional key personnel, if needed.

We have sold Prociclide and Noravid (two formulations of defibrotide) in Italy to treat vascular disease with risk of thrombosis, which may affect the pricing of defibrotide in Europe for the prevention or treatment of VOD.

Until December 31, 2008, through a distribution agreement with Crinos S.p.A., we sold Prociclide and Noravid (both forms of defibrotide) in Italy to treat vascular disease with risk of thrombosis. While we have stopped selling Prociclide and Noravid for this treatment in Italy, when defibrotide is approved for sale in Europe to treat and/or prevent VOD, we may need to obtain regulatory approval of the price we charge for these uses of defibrotide. The regulators may impose an artificially low cap on defibrotide based on the relatively low price-point of Prociclide and Noravid previously sold in Italy for the treatment of vascular disease with risk of thrombosis.

All of our manufacturing capability is located in one facility that is vulnerable to natural disasters, telecommunication and information system failures, terrorism and similar problems, and we are not insured against losses that may be caused by any of these occurrences or events.

We conduct all of our manufacturing operations in a single facility located in Villa Guardia, near Como, Italy. This facility could be damaged by fire, flood, earthquake, power loss, telecommunication and information system failure, terrorism or a similar event. Our insurance covers damages to the facility, including the buildings, machinery, electronic equipment and goods, of up to approximately €22 million, but does not cover damages caused by any of the events listed above, including terrorism and some types of flooding. Although we believe that our insurance coverage is adequate for our current and proposed operations, there can be no guarantee that it will adequately compensate us for any losses that may occur. We are not insured against business interruption and we do not have a replacement manufacturing facility readily available.

Our industry is highly competitive and subject to rapid technological changes. As a result, we may be unable to compete successfully or to develop innovative products, which could harm our business.

Our industry is highly competitive and subject to significant and rapid technological change as researchers learn more about diseases and develop new technologies and treatments. Incidence of VOD may decrease with new technologies and conditioning regimens, which will negatively impact our sales opportunities. While we are unaware of any other products or product candidates that treat or prevent VOD, we believe that other companies may have products or are currently developing products to treat some of the same disorders and diseases that defibrotide is designed to treat.

Many of these competitors have substantially greater research and development capabilities and experience, and greater manufacturing, marketing and financial resources than we have. In addition, these companies' products and product candidates are in more advanced stages of development than our product candidates or have otherwise been approved for sale by the FDA and other regulatory agencies. As a result, these companies may be able to develop their product candidates and establish their products in the market before we can. Their products may also prove to be more

effective, safer or less costly than defibrotide, which could hurt our ability to realize any significant revenues.

In May 2003, the FDA designated defibrotide as an orphan drug to treat VOD, and in January 2007, the FDA designated defibrotide as an orphan drug to prevent VOD. If the FDA approves NDAs for these uses of defibrotide, before approving a NDA filed by anyone else, the orphan drug status will grant us limited market exclusivity for seven years from the date of the FDA's approval of our NDA. However, a marketing authorization may be granted to another applicant for the same product if we give our consent to such authorization, if we are unable to supply sufficient quantities of defibrotide, or if the second applicant can establish in its application that its product is safer, more effective or otherwise clinically superior to our product. In that case, our product would not have market exclusivity. There is no guarantee that the FDA will approve our NDA, if and when we are ready to resubmit, before approving another company's product for the same uses, although we are not aware of any other company that is researching defibrotide for these uses at this time. In such a case, however, the first product approved would have market exclusivity and our products would not be eligible for approval until that exclusivity period expires.

In July 2004, the EMA designated defibrotide as an orphan medicinal product to both treat and prevent VOD. If the European regulators do grant us a marketing authorization for those uses of defibrotide, we will have limited market exclusivity for those uses for ten years following the date of the approval. However, a marketing authorization may be granted to another applicant for the same product if we consent to such authorization, we are unable to supply sufficient quantities of defibrotide, or the second applicant can establish in its application that its product is safer, more effective or otherwise clinically superior to our product. In that case, our product would not have market exclusivity.

If we are unable to adequately protect our intellectual property, our ability to compete could be impaired.

Our long-term success largely depends on our ability to create and market competitive products and to protect those creations. Our pending patent applications, or those applications that we may file in the future, may not be granted. Until a patent is issued, the claims covered by the patent may be narrowed or removed entirely and, therefore, we may not obtain adequate patent protection. As a result, we may face unanticipated competition, or conclude that the risk of bringing products to the market is too great, thus adversely affecting our operating results.

Because of the extensive time required to develop, test and complete a regulatory review of a product candidate, it is possible that our relevant patent rights may expire either before defibrotide can be approved for sale and commercialized or within a short time after commercialization. We have been issued a patent in the U.S. and several other countries which covers the method for determining the biological activity of defibrotide. The patent expires in 2022 in most countries. This patent is important because the analytical release of a biological product like defibrotide is a key step in confirming the purity and biological activity of the final product. There may not be an opportunity to extend this patent and thereby extend the exclusivity period related to the FDA and the EMA, in which case we could face increased competition for defibrotide. Patent expiration could adversely affect our ability to protect future product development and, consequently, our operating results and financial position. In addition, generic innovators may be able to circumvent this patent and design a novel analytical method for determining the biological activity of defibrotide. In this case, a generic defibrotide could potentially be on the market once the relevant protections offered by our orphan designations end.

We also rely on trade secrets to protect our technology, particularly when patent protection is inappropriate or unattainable. However, trade secrets are difficult to protect. While we use reasonable efforts to protect our trade secrets, our employees, consultants, contractors, outside scientific collaborators and other advisors may unintentionally or willfully disclose our information to competitors. To enforce a claim against a third party for illegally obtaining and using our trade secrets is expensive and time consuming, and the outcome is unpredictable. In addition, courts outside the United States are sometimes less willing to protect trade secrets. We intend to eventually license or sell our products in China, South Korea and other countries which do not afford intellectual property rights and protections to the extent that United States and Europe do. Moreover, our competitors may independently develop equivalent knowledge, methods and know-how.

Risks Related to Ownership of the American Depositary Shares

Our ADSs have generally had low trading volume, and their public trading price has been volatile.

The market price of our common stock has been highly volatile. Between our initial public offering on June 21, 2005 and June 30, 2013, the closing price of our ADSs has fluctuated between $0.33 and $24.40 per share, with an average daily trading volume for the twelve-month period ended December 31, 2012 of approximately 21,724 ADSs. The market has experienced significant price and volume fluctuations for many reasons, some of which may be unrelated to our operating performance.

In addition to general market volatility, other factors that may have a significant adverse effect on the market price of our ADSs include:

- public announcements of decisions made by regulators in both the United States and abroad;
- public announcements of improvements, new commercial products, failures of products, or progress toward commercialization by our competitors or peers;
- the influence of commercial partner and significant shareholder, Sigma-Tau Finanziaria S.p.A.;

- developments concerning proprietary rights, including patent and litigation matters;
- publicity regarding actual or potential results with respect to product candidates under development by us or by our competitors;
- regulatory developments; and
- quarterly fluctuation in our revenues and financial results.

One of our largest shareholders and our founder exercises significant control over us, which may make it more difficult for you to elect or replace directors or management and approve or reject mergers and other important corporate events, including obtaining potential financing.

One of our largest shareholders and our founder, F3F S.r.l. owned approximately 17% of our outstanding ordinary shares at June 30, 2013. Dr. Laura Ferro, our former Chief Executive Officer and President and a current member of our board of directors, together with members of her family, may be deemed to control F3F S.r.l.

In addition, Sigma-Tau Finanziaria S.p.A., along with its affiliates, owned approximately 18% of our outstanding ordinary shares at December 31, 2012. Dr. Marco Brughera, who holds various senior-level positions within the Sigma-Tau Group, serves as a member of our Board of Directors. Moreover, we have licensed our rights in defibrotide to treat and prevent VOD to Sigma-Tau Pharmaceuticals, Inc., a wholly-owned subsidiary of Sigma-Tau Finanziaria.

Both F3F S.r.l. and Sigma-Tau Finanziaria may substantially control the outcome of all matters requiring approval by our shareholders, including the election of directors and the approval of mergers or other important corporate events. They may exercise this ability in a manner that advances their best interests, and not necessarily your best interest. Also, the concentration of our beneficial ownership may have the effect of delaying, deterring or preventing a change in control, or may discourage bids for the ADSs or our ordinary shares at a premium over the market price of the ADSs. The significant concentration of share ownership may adversely affect the trading price of the ADSs due to investors' perception that conflicts of interest may exist or arise.

As discussed in our risk factor entitled "Our shareholders can prevent us from executing a financing by alleging that our board of directors acted with serious irregularities when approving such financing, because the terms of such financing could harm our company," each of F3F S.r.l. and Sigma-Tau Finanziaria own a percentage of our ordinary shares sufficient to bring legal action against our board of directors and to possibly prevent us from completing an important corporate event, such as a financing. In addition, under Italian law, directors are not required to recuse themselves from participation in matters that present a conflict of interest, unless they have been vested with management powers. They are merely required to declare the conflict of interest that pertains to the matter. Accordingly, directors who are affiliated with our shareholders may be present for certain discussions that involve or impact the shareholders to which such directors are affiliated.

If a significant number of ADSs are sold into the market, the market price of the ADSs could significantly decline, even if our business is doing well.

Our outstanding ordinary shares and ordinary shares issuable upon exercise of options are not subject to lock-up agreements. We have filed registration statements for the resale of most of our outstanding ordinary shares and related ADSs and all of our ordinary shares and related ADSs issuable upon exercise of our outstanding options. Such registration and the ultimate sale of the securities in the markets may adversely affect the market for the ADSs.

You do not have the ability to exercise your voting rights in the same manner as the holders of our ordinary shares and may not receive voting materials in time to instruct the depository to exercise your right to vote.

Except as described in this prospectus and in the deposit agreement for the ADSs with our depositary, The Bank of New York Mellon, holders of the ADSs will not be able to exercise voting rights attaching to the ordinary shares evidenced by the ADSs on an individual basis. Holders of the ADSs will only have the right to instruct the depositary, as the holders' representative, to exercise these voting rights. In addition, you may not receive voting materials in time to instruct the depositary to vote, and it is possible that you, or persons who hold ADSs through brokers, dealers or other third parties, will not have the opportunity to exercise a right to vote.

You may not be able to participate in rights offerings and may experience dilution of your holdings as a result.

We may from time to time offer to our existing shareholders the right to purchase our securities. Under our deposit agreement for the ADSs, the depositary will not offer those rights to ADS holders unless both the rights and the underlying securities to be distributed to ADS holders are either registered under the Securities Act of 1933, as amended, or exempt from registration under the Securities Act with respect to all holders of ADSs. We are under no obligation to file a registration statement with respect to any such rights or underlying securities or to endeavor to cause such a registration statement to be declared effective. In addition, we may not be able to take advantage of any

exemptions from registration under the Securities Act. Accordingly, holders of our ADSs may be unable to participate in our rights offerings and may experience dilution in their holdings as a result.

You may be subject to limitations on transfer of your ADSs.

Your ADSs represented by American Depositary Receipts, or ADRs, are transferable on the books of the depositary. However, the depositary may close its transfer books at any time or, from time to time, when it deems expedient, in connection with the performance of its duties. In addition, the depositary may refuse to deliver, transfer or register transfers of ADSs generally when our books or the books of the depositary are closed, or if we or the depositary deem it advisable to do so under any requirement of law, any government or governmental body, any provision of the deposit agreement, or for any other reason.

Risks Relating to Being an Italian Corporation

The process of seeking to raise additional funds is cumbersome, subject to the verification of an Italian notary public in compliance with our bylaws and applicable law, and may require prior approval of our shareholders at an extraordinary shareholders' meeting.

We are incorporated under the laws of the Republic of Italy. The principal laws and regulations that apply to our operations, those of Italy and the European Union, are different from those of the United States. With some exceptions, in order to issue new equity or debt securities convertible into equity, we must increase our authorized capital. In order to do so, our board of directors must meet and resolve to recommend that our shareholders approve an amendment to our bylaws increasing our capital. The holders of the majority of our outstanding shares must then approve that amendment at an extraordinary shareholders' meeting duly called. These meetings take time to call and it might be very difficult to get a majority of the holders of all outstanding shares to vote in favor of the proposed resolution. In addition, an Italian notary public must verify that the capital increase is in compliance with our bylaws and with applicable Italian law. Further, under Italian law, our existing shareholders and any holders of convertible securities have preemptive rights (except in specific cases) to acquire any such shares pro-rated on their percentage interest in our company, and on the same terms as approved for such capital increase. Alternatively, our shareholders can delegate the power to increase our capital to the board of directors, but the board's right to exercise such power, if delegated, will expire after five years. If the board does not approve a capital increase by the end of those five years, our board and shareholders would need to meet again to re-delegate this authority.

With respect to shareholders' resolutions approving a capital increase, Italian law provides that in the absence of meeting minutes, or in the event of the impossibility or illegality of the resolution, any interested person may, for a period of 180 days following the filing of the shareholders' resolution with the competent Register of Companies, challenge such resolution. If a shareholders' meeting was not called to approve the capital increase, the relevant resolution should be considered invalid and, any interested person may challenge the capital increase for a period of 90 days following the approval of the consolidated financial statements referring to the year during which the shareholders' resolution has been, also partially, executed. In addition, once our shareholders authorize a capital increase, all those authorized shares that have been subscribed need to be entirely paid-up before the shareholders may authorize a new capital increase. These restrictions could limit our ability to issue new equity or convertible debt securities on a timely basis.

Our shareholders can prevent us from executing a financing by alleging that our board of directors acted with serious irregularities when approving such financing, because the terms of such financing could harm our company.

On August 12, 2008, Sigma-Tau Finanziaria S.p.A., together with one of its affiliates, filed a claim in the Court of Como claiming that the members of our board of directors and our board of statutory auditors acted with serious irregularities, in violation of their duties as directors, in approving a potential financing because such financing was potentially harmful to the company. On August 18, 2008, the Court of Como issued a temporary order preventing us from moving forward with the potential financing. While this claim was later dismissed for lack of damages, the claim did, nonetheless, prevent the directors from implementing the financing. Any shareholder or group of shareholders constituting at least 10% of our outstanding ordinary shares could bring a similar action on a future board resolution regarding a financing or other important corporate action, and an Italian court could prevent the transaction from moving forward by issuing an order to that effect.

Italian law places restrictions on the amount of debt securities that we may issue relative to our equity to the extent that such debt securities are not listed on regulated markets or do not otherwise provide the holder of such securities the right to purchase or convert the same into our shares.

Under Italian law, we may issue debt securities in an amount not to exceed twice the sum of our capital, our legal reserve and any other disposable reserves appearing on our latest Italian GAAP balance sheet approved by our shareholders, unless the debt securities are listed on regulated markets or provide the holder of such securities the right to purchase or convert the same into our shares, in which case such restrictions do not apply. The legal reserve is a reserve to which we allocate 5% of our Italian GAAP net income each year until it equals at least 20% of our capital. One of the other reserves that we maintain on our balance sheet is a "share premium reserve," meaning amounts paid for our ordinary shares in excess of the amount of such ordinary shares that is allocated to the capital. At December 31, 2012, the sum of Gentium S.p.A. capital, legal reserves and other reserves on our audited Italian GAAP financial statements was €38.97 million. If, in the future, we issue debt securities that are not listed on regulated markets or do not provide the holder of the securities the right to purchase or convert the same into our shares, until such debt securities are repaid in full, we may not voluntarily reduce our capital or allocate our reserves (such as by declaring dividends) if it results in the aggregate of the capital and reserves being less than half of the outstanding amount of the debt. In such a case, if our equity is reduced by losses or otherwise such that the amount of the outstanding debt securities is more than twice the amount of our equity, some legal scholars are of the opinion that the ratio must be restored through a recapitalization of our company. If our equity is reduced, we could recapitalize by issuing new shares or having our shareholders contribute additional capital to us, although there can be no assurance that we would be able to find purchasers of new shares or that any of our current shareholders would be willing to contribute additional capital.

If we suffer losses that reduce our capital to less than €120 thousand, we would need to recapitalize, change our form of entity or be liquidated.

Italian law requires us to reduce our shareholders' equity and, in particular, our capital, to reflect on-going losses, in certain cases of losses exceeding 1/3 of the capital of the Company. We are also required to maintain a minimum capital of €120 thousand. At December 31, 2012, our audited Italian GAAP capital was approximately €15.04 million. If we suffer losses from operations that reduce our capital to less than €120 thousand, then we must either increase our capital (which we could do by issuing new shares or having our shareholders contribute additional capital to our company) to at least €120 thousand or convert the form of our company into an S.r.l., which has a lower capital requirement of €10 thousand. If we do not take these steps, our company could be liquidated.

We apply our operational losses against our legal reserves and capital. If our capital is reduced more than one-third as a result of losses, our board of directors must call a shareholders' meeting as soon as possible. The shareholders should take appropriate measures, which may include, inter alia, reducing the legal reserves and capital by the amount of the remaining losses, or carrying the losses forward for up to one year. If the shareholders vote to carry the losses forward up to one year, and the losses are still more than one-third of the amount of the capital at the end of the year, then we must reduce our capital by the amount of the losses.

Due to the differences between Italian and U.S. law, the depositary (acting as a shareholder on your behalf) may have fewer shareholder rights than you would have as a shareholder of a U.S. company.

We are incorporated under the laws of the Republic of Italy. As a result, the rights and obligations of our shareholders are governed by Italian law and our bylaws, and are in some ways different from those that apply to U.S. corporations. Some of these differences may result in the depositary (on your behalf) having fewer shareholder rights than you would have as a shareholder of a U.S. corporation. We have presented a detailed comparison of the Italian laws applicable to our company versus Delaware law in "Item 10, Additional Information, Comparison of Italian and Delaware Corporate Law" of our annual report on Form 20-F for the fiscal year ended December 31, 2012, filed with the SEC on April 1, 2013 and amended on April 30, 2013. We compare the Italian laws applicable to our company against Delaware law because Delaware is the most common state of incorporation for U.S. public companies.

Italian labor laws could impair our flexibility to restructure our business.

In Italy, our employees are protected by various laws which afford them consultation rights with respect to specific matters regarding their employers' business and operations, including the downsizing or closure of facilities and employee terminations. In particular: (i) Law no. 604/1966, regulates the individual dismissals; (ii) Law no. 223/1991, concerns the collective dismissal procedure; (iii) Law no. 428/1990 as amended by legislative decree no. 18/2001, provides for the information and consultation procedure in case of a transfer of the undertaking or a part thereof and (iv) Legislative decree no. 25/2007, introduces a general right to information and consultation for employees. These laws and the collective bargaining agreements to which we are subject could impair our flexibility if we need to restructure our business.

WARNING REGARDING FORWARD-LOOKING STATEMENTS

This prospectus may contain forward-looking statements that involve substantial risks and uncertainties regarding future events or our future performance. When used in this prospectus, the words "anticipate," "believe," "estimate," "may," "intent," "continue," "will," "plan," "intend," and "expect" and similar expressions identify forward-looking statements. should read statements that contain these words carefully because they discuss our future expectations contain projections of our future results of operations or of our financial condition or state other "forward-looking" information. We believe that it is important to communicate our future expectations to our investors. Although we believe that our expectations reflected in any forward-looking statements are reasonable, these expectations may not be achieved. The factors listed in the section captioned "Risk Factors," as well as any cautionary language included in this prospectus or incorporated by reference, provide examples of risks, uncertainties and events that may cause our actual results to differ materially from the expectations we describe in our forward-looking statements. Before you invest in our ordinary shares or ADSs, you should be aware that the occurrence of the events described in the "Risk Factors" section and elsewhere in this prospectus could have a material adverse effect on our business, performance, operating results and financial condition. All subsequent written and oral forward-looking statements attributable to us or persons acting on our behalf are expressly qualified in their entirety by the cautionary statements set forth in this prospectus. Except as required by federal securities laws, we are under no obligation to update any forward-looking statement, whether as a result of new information, future events, or otherwise.

You should rely only on the information contained in this prospectus. We have not authorized anyone to provide you with information different from that contained in this prospectus. We are offering to sell and seeking offers to buy our ordinary shares only in jurisdictions where offers and sales are permitted. The information contained in this prospectus is accurate only as of the date of this prospectus, regardless of the time of delivery of this prospectus or any sale of our ordinary shares.

CAPITALIZATION AND INDEBTEDNESS

The following table summarizes our capitalization and indebtedness as of June 30, 2013 on an actual basis. You should read the following table in conjunction with our financial statements and related notes from our annual report on Form 20-F and other reports on Form 6-K incorporated by reference into this prospectus. Euro amounts are translated into U.S. dollars using the Noon Buying Rate for the Euro on June 30, 2013, of U.S. $1.3266 per Euro.

	As of June 30, 2013 (unaudited)	As of June 30, 2013 (unaudited)
	(in thousands, except share and per share data)	
Indebtedness:		
Mortgage loans secured by real property	€ 1,200	$ 1,592
Equipment loans	27	36
Financing loans	93	123
	1,320	1,751
Less current maturities	(360)	(478)
Long-term debt, net of current maturities	960	1,273
Shareholders' Equity:		
Share capital, (no par value, 19,656,317 shares authorized as of June 30, 2013; 15,173,467 shares issued and outstanding at June 30, 2013)	109,629	145,434
Accumulated deficit	(85,124)	(112,926)
Total Security holders' Equity	24,505	32,508
Total Capitalization	€ 25,465	$ 33,781

REASONS FOR THE OFFER AND USE OF PROCEEDS

F3F is the founder of our Company and holds 2,550,000 of our ordinary shares. We understand that F3F wishes to sell some of its ordinary shares to pay toward its existing debts.

We will not receive any proceeds from the sale by the selling security holder of the securities offered in this prospectus. F3F will reimburse us for the expenses incurred for the offering. We expect that F3F will sell its ADSs as described under "Plan of Distribution."

DETERMINATION OF OFFERING PRICE

The selling security holder may offer and sell its ADSs on the Nasdaq Global Market System at prevailing market prices. The selling security holder may also offer and sell its ADSs in privately negotiated transactions at prices other than the market price.

PRICE HISTORY

Our ADSs are listed on Nasdaq under the symbol "GENT." Neither our ordinary shares nor our ADSs are listed on a securities exchange outside the United States. The Bank of New York Mellon is our depositary for the ADSs. Each ADS represents one ordinary share.

Trading in our ADSs on the Nasdaq Global Market commenced on May 16, 2006. Prior to this date, our ADSs were traded on the American Stock Exchange, beginning June 16, 2005 and ending on May 15, 2006, the date we de-listed. The following table sets forth, for each of the periods indicated, the high and low closing prices per ADS as reported by Nasdaq.

	Price Range of ADSs	
	High	Low
2008	$13.98	$0.44
2009	$3.87	$0.33
2010	$7.20	$1.32
2011		
First Quarter	$12.13	$6.88
Second Quarter	$10.38	$9.05
Third Quarter	$9.99	$6.00
Fourth Quarter	$6.32	$5.65
Full Year	$12.13	$5.65
2012		
First Quarter	$9.20	$5.51
Second Quarter	$9.75	$8.76
Third Quarter	$11.16	$9.13
Fourth Quarter	$12.35	$9.92
Full Year	$12.35	$5.51
2013		
First Quarter	$12.59	$7.74
Second Quarter	$8.90	$7.37
Month Ended		
July 31, 2013	$14.80	$7.76
August 31, 2013(through August 27, 2013)	$21.24	$14.15

The closing price of the ADSs on Nasdaq on August 27, 2013 was $20.00.

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Sources: The Nasdaq Stock Market.

SELLING SECURITY HOLDER

Our ADSs to which this prospectus relates are being registered for resale by the selling security holder, F3F S.r.l.

The selling security holder may resell all, a portion or none of such ADSs from time to time. The table below sets forth the selling security holder, based upon information available to us as of August 27, 2013, the number and percentage of ordinary shares exercisable into ADSs beneficially owned before this offering, the number of ADSs registered for resale by this prospectus and the number and percent of ADSs that will be beneficially owned immediately after this offering assuming the sale of all of the registered ADSs.

Beneficial ownership and percentage ownership are determined in accordance with the rules of the SEC. ADSs or ordinary shares underlying our convertible securities that are exercisable within 60 days from August 27, 2013 are deemed outstanding for computing the amount and percentage owned by the person or group holding such convertible securities, but are not deemed outstanding for computing the percentage owned by any other person or group.

	ADSs Beneficially Owned Before The Offering		ADSs Offered	ADSs Beneficially Owned After The Offering	
Holder	ADSs	Percent		ADSs	Percent
F3F S.r.l. (1)	2,550,000	16.70 %	300,000	2,250,000	14.73 %

(1) Address is Piazza XX Settembre 2, 22079 Villa Guardia (Como), Italy. Dr. Laura Ferro, our former Chief Executive Officer and President and a current member on the Company's board of directors, may be deemed to share voting or dispositive control with F3F over the ordinary shares in Gentium that F3F beneficially owns. Dr. Ferro disclaims beneficial ownership of such shares.

We currently lease commercial space from F3F.

The information provided above with respect to the selling security holder has been obtained from such selling security holder. Because the selling security holder may sell all or some portion of the ADSs or ordinary shares beneficially owned by it, only an estimate (assuming the selling security holder sells all of the ADSs or ordinary shares offered in this prospectus) can be given as to the number of ADSs or ordinary shares that will be beneficially owned by the selling security holder after this offering, and as to the percentage of all outstanding ADSs or ordinary shares constituted by such ADSs or ordinary shares. In addition, the selling security holder may have sold, transferred or otherwise disposed of, or may sell, transfer or otherwise dispose of, at any time or from time to time since the dates on which it provided the information regarding the ADSs or ordinary shares beneficially owned by it, all or a portion of the ADSs or ordinary shares beneficially owned by it in transactions exempt from the registration requirements of the Securities Act.

PLAN OF DISTRIBUTION

The selling security holder and any of its pledgees, assignees and successors-in-interest may, from time to time, sell any or all of its ADSs on the Nasdaq Global Market System or any other stock exchange, market or trading facility on which the ADSs are traded or in private transactions. These sales may be at fixed or negotiated prices. The selling security holder may use any one or more of the following methods when selling ADSs:

- ordinary brokerage transactions and transactions in which the broker-dealer solicits purchasers;
- block trades in which the broker-dealer will attempt to sell the shares as agent but may position and resell a portion of the block as principal to facilitate the transaction;
- purchases by a broker-dealer as principal and resale by the broker-dealer for its account;
- an exchange distribution in accordance with the rules of the applicable exchange;
- public or privately negotiated transactions;
- settlement of short sales entered into after the effective date of the registration statement of which this prospectus is a part;
- on the Nasdaq Global Market System (or through facilities of any national securities exchange or US inter-dealer quotation system of a registered national securities association on which the ADSs are then listed, admitted to unlisted trading privileges or included for quotation);
- broker-dealers may agree with the selling security holder to sell a specified number of such ADSs at a stipulated price per ADSs;
- through underwriters, brokers or dealers (who may act as agents or principals) or directly to one or more purchasers;
- through the writing or settlement of options or other hedging transactions, whether through an options exchange or otherwise;
- a combination of any such methods of sale; or
- any other method permitted pursuant to applicable law.

The selling security holder may also sell shares under Rule 144 under the Securities Act of 1933, as amended, if available, rather than under this prospectus.

Broker-dealers engaged by the selling security holder may arrange for other brokers-dealers to participate in sales. Broker-dealers may receive commissions or discounts from the selling security holder (or, if any broker-dealer acts as agent for the purchaser of shares, from the purchaser) in amounts to be negotiated, but, except as set forth in a supplement to this Prospectus, in the case of an agency transaction not in excess of a customary brokerage commission in compliance with NASDR Rule 2440; and in the case of a principal transaction a markup or markdown in compliance with NASDR IM-2440.

In connection with the sale of the ADSs or interests therein, the selling security holder may enter into hedging transactions with broker-dealers or other financial institutions, which may in turn engage in short sales of the ADSs in

the course of hedging the positions they assume. The selling security holder may also sell the ADSs short and deliver these securities to close out its short positions, or loan or pledge the ADSs to broker-dealers that in turn may sell these securities. The selling security holder may also enter into option or other transactions with broker-dealers or other financial institutions or the creation of one or more derivative securities which require the delivery to such broker-dealer or other financial institution of ADSs offered by this prospectus, which ADSs such broker-dealer or other financial institution may resell pursuant to this prospectus (as supplemented or amended to reflect such transaction). The selling security holder may also pledge ADSs to a broker-dealer or other financial institution which, upon default, they may in turn resell.

In addition to the foregoing methods, the selling security holder may offer its ADSs from time to time in transactions involving principals or brokers not otherwise contemplated above, in a combination of such methods or described above or any other lawful methods. The selling security holder may also transfer, donate or assign its ADSs to lenders, family members and others and each of such persons will be deemed to be a selling security holder for purposes of this prospectus. The selling security holder or its successors in interest may from time to time pledge or grant a security interest in some or all of the ADSs, and if the selling security holder defaults in the performance of its secured obligations, the pledgees or secured parties may offer and sell the ADSs from to time under this prospectus; provided, however, in the event of a pledge or then default on a secured obligation by the selling security holder, in order for the ADSs to be sold under this prospectus, unless permitted by law, we must distribute a prospectus supplement and/or amendment to the registration statement of which this prospectus forms a part amending the list of selling security holders to include the pledgee, secured party or other successors in interest of tdding:0in 0in 0in 0in;width:78.86%;">

Printing and EDGAR Costs*	$	2,000
Total*	**$**	**13,636.89**

* Estimated solely for the purposes of this Item 14. Actual expenses may vary.

ITEM 15. INDEMNIFICATION OF DIRECTORS AND OFFICERS

Section 102 of the Delaware General Corporation Law, or DGCL, provides that a corporation, in its certificate of incorporation, may eliminate or limit personal liability of members of its board of directors for breach of a director s fiduciary duty. However, no such provision may eliminate or limit the liability of a director for breaching a duty of loyalty, failing to act in good faith, engaging in intentional misconduct or knowingly

violating a law, paying a dividend or approving a stock repurchase which was illegal, or obtaining an improper personal benefit. Article VIII of our Amended and Restated Certificate of Incorporation contains such a provision.

Section 145(a) of the DGCL provides that a Delaware corporation may indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action, suit or proceeding, whether civil, criminal, administrative or investigative (other than an action by or in the right of the corporation) by reason of the fact that he is or was a director, officer, employee or agent of the corporation or is or was serving at the request of the corporation as a director, officer, employee or agent of another corporation or enterprise, against expenses, judgments, fines and amounts paid in settlement actually and reasonably incurred by him in connection with such action, suit or proceeding if he acted in good faith and in a manner he reasonably believed to be in or not opposed to the best interests of the corporation, and, with respect to any criminal action or proceeding, he had no cause to believe his conduct was unlawful.

Section 145(b) of the DGCL provides that a Delaware corporation may indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action or suit by or in the right of the corporation to procure a judgment in its favor by reason of the fact that such person acted in any of the capacities set forth above, against expenses actually and reasonably incurred by him in connection with the defense or settlement of such action or suit if he acted under similar standards, except that no indemnification may be made in respect of any claim, issue or matter as to which such person shall have been adjudged to be liable to the corporation unless and only to the extent that the court in which such action or suit was brought shall determine that despite the adjudication of liability, such person is fairly and reasonably entitled to be indemnified for such expenses which the court shall deem proper.

Section 145 of the DGCL further provides that to the extent a director or officer of a corporation has been successful in the defense of any action, suit or proceeding referred to in subsections (a) and (b) or in the defense of any claim, issue, or matter therein, he shall be indemnified against expenses (including attorneys fees) actually and reasonably incurred by him in connection therewith; that indemnification provided for by Section 145 shall not be deemed exclusive of any other rights to which the indemnified party may be entitled; and that the corporation may purchase and maintain insurance on behalf of a director, officer, employee or agent of the corporation against any liability asserted against him or incurred by him in any such capacity or arising out of his status as such whether or not the corporation would have the power to indemnify him against such liabilities under such Section 145.

Article IX of our Amended and Restated Certificate of Incorporation requires that we indemnify our directors and officers to the fullest extent allowed by law and pay expenses incurred in defending any such proceeding in advance of its final disposition upon delivery to us of an undertaking, by or on behalf of an indemnified person, to repay all amounts so advanced if it should be determined ultimately that such person is not entitled to be indemnified under this section or otherwise. We have obtained insurance policies insuring our directors and officers against certain liabilities that they may incur in their capacity as directors and officers.

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In addition, we have entered into indemnification agreements with each of our directors and officers which require us to indemnify our directors and officers to the fullest extent permitted by the DGCL.

ITEM 16. EXHIBITS

Exhibit No.	Description
5.1	Opinion of Davis Graham & Stubbs LLP
23.1	Consent of Davis Graham & Stubbs LLP (included in Exhibit 5.1)
23.2	Consent of PricewaterhouseCoopers LLP
23.3	Consent of EKS&H LLLP
23.4	Consent of Chlumsky, Armbrust & Meyer
23.5	Consent of RungePincockMinarco
24	Power of Attorney (included in signature page)

ITEM 17. UNDERTAKINGS

(a) The undersigned registrant hereby undertakes:

(1) To file, during any period in which offers or sales are being made, a post-effective amendment to this registration statement

(i) To include any prospectus required by Section 10(a)(3) of the Securities Act of 1933;

(ii) To reflect in the prospectus any facts or events arising after the effective date of the registration statement (or the most recent post-effective amendment thereof) which, individually or in the aggregate, represent a fundamental change in the information set forth in the registration statement. Notwithstanding the foregoing, any increase or decrease in the volume of securities offered (if the total dollar value of securities offered would not exceed that which was registered) and any deviation from the low or high end of the estimated maximum offering range may be reflected in the form of prospectus filed with the Commission pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than a 20% change in the maximum aggregate offering price set forth in the CALCULATION OF REGISTRATION FEE table in the effective registration statement;

(iii) To include any material information with respect to the plan of distribution not previously disclosed in the registration statement or any material change to such information in the registration statement;

Provided, however, that:

paragraphs (a)(1)(i) and (a)(1)(ii) and (a)(1)(iii) of this section do not apply if the registration statement is on Form S-3 or Form F-3 and the information required to be included in a post-effective amendment by those paragraphs is contained in reports filed with or furnished to the Commission by the registrant pursuant to Section 13 or Section 15(d) of the Securities Exchange Act of 1934 that are incorporated by reference in the registration statement, or is contained in a form of prospectus filed pursuant to Rule 424(b) that is part of the registration statement.

(2) That, for the purpose of determining any liability under the Securities Act of 1933, each post-effective amendment shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(3) To remove from registration by means of a post-effective amendment any of the securities being registered that remain unsold at the termination of the offering.

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(4) That, for the purpose of determining liability under the Securities Act of 1933 to any purchaser:

(i) If the registrant is relying on Rule 430B:

(A) Each prospectus filed by the registrant pursuant to Rule 424(b)(3) shall be deemed to be part of the registration statement as of the date the filed prospectus was deemed part of and included in the registration statement; and

(B) Each prospectus required to be filed pursuant to Rule 424(b)(2), (b)(5), or (b)(7) as part of a registration statement in reliance on Rule 430B relating to an offering made pursuant to Rule 415(a)(1)(i), (vii), or (x) for the purpose of providing the information required by section 10(a) of the Securities Act of 1933 shall be deemed to be part of and included in the registration statement as of the earlier of the date such form of prospectus is first used after effectiveness or the date of the first contract of sale of securities in the offering described in the prospectus. As provided in Rule 430B, for liability purposes of the issuer and any person that is at that date an underwriter, such date shall be deemed to be a new effective date of the registration statement relating to the securities in the registration statement to which that prospectus relates, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof. Provided, however, that no statement made in a registration statement or prospectus that is part of the registration statement or made in a document incorporated or deemed incorporated by reference into the registration statement or prospectus that is part of the registration statement will, as to a purchaser with a time of contract of sale prior to such effective date, supersede or modify any statement that was made in the registration statement or prospectus that was part of the registration statement or made in any such document immediately prior to such effective date.

(b) The undersigned registrant hereby undertakes that, for purposes of determining any liability under the Securities Act of 1933, each filing of the registrant s annual report pursuant to Section 13(a) or Section 15(d) of the Securities Exchange Act of 1934 (and, where applicable, each filing of an employee benefit plan s annual report pursuant to section 15(d) of the Securities Exchange Act of 1934) that is incorporated by reference in the registration statement shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

(c) Insofar as indemnification for liabilities arising under the Securities Act of 1933 may be permitted to directors, officers and controlling persons of the registrant pursuant to the foregoing provisions, or otherwise, the registrant has been advised that in the opinion of the Securities and Exchange Commission such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the registrant of expenses incurred or paid by a director, officer or controlling person of the registrant in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, the registrant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

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SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, the registrant certifies that is has reasonable grounds to believe that it meets all of the requirements for filing on Form S-3 and has duly caused this registration statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Golden, State of Colorado, on November 24, 2014.

GOLDEN MINERALS COMPANY

By:	/s/ JEFFREY G. CLEVENGER
Name:	Jeffrey G. Clevenger
Title:	President and Chief Executive Officer

POWER OF ATTORNEY

Each of the undersigned hereby constitutes and appoints Jeffrey G. Clevenger and Robert P. Vogels, and each of them, the undersigned s true and lawful attorney-in-fact and agent, with full power of substitution, for the undersigned and in his name, place and stead, to sign in any and all capacities (including, without limitation, the capacities listed below), the registration statement, any and all amendments (including post-effective amendments) to the registration statement and any and all successor registration statements of Golden Minerals Company, including any filings pursuant to Rule 462(b) under the Securities Act of 1933, as amended, and to file the same, with all exhibits thereto, and all other documents in connection therewith, with the Securities and Exchange Commission, and hereby grants to such attorneys-in-fact and agents, and each of them, full power and authority to do and perform each and every act and anything necessary to be done to enable Golden Minerals Company to comply with the provisions of the Securities Act and all the requirements of the Securities and Exchange Commission, as fully to all intents and purposes as the undersigned might or could do in person, hereby ratifying and confirming all that said attorneys-in-fact and agents, or any of them, or their or his or her substitute, or substitutes, may lawfully do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Act of 1933, this registration statement has been signed by the following persons in the capacities and on the dates indicated:

Signature	Title	Date
/s/ JEFFREY G. CLEVENGER Jeffrey G. Clevenger	President and Chief Executive Officer (Principal Executive Officer) and Chairman of the Board of Directors	November 24, 2014
/s/ ROBERT P. VOGELS Robert P. Vogels	Senior Vice President, Chief Financial Officer (Principal Financial and Accounting Officer)	November 24, 2014
/s/ W. DURAND EPPLER W. Durand Eppler	Director	November 24, 2014
/s/ MICHAEL T. MASON Michael T. Mason	Director	November 24, 2014
/s/ IAN MASTERTON-HUME	Director	November 24, 2014

Ian Masterton-Hume		
/s/ KEVIN R. MORANO Kevin R. Morano	Director	November 24, 2014
/s/ TERRY M. PALMER Terry M. Palmer	Director	November 24, 2014
Andrew N. Pullar	Director	
/s/ DAVID H. WATKINS David H. Watkins	Director	November 24, 2014

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