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CASTE, *kāst*, one of many hereditary units in the social systems of India, Pakistan, and Ceylon. Membership in a caste can be obtained only through birth and cannot later be changed. Avoidance or denial of caste affiliation may be achieved by moving out of the region where one's caste exists, but by no other means. Social action may ostracize a person from his caste, but this does not free him to take up affiliation elsewhere. Despite agreement on these features of caste, the word is now used in two different ways.

In its more generalized sense, caste is coupled with class and refers to any group, the membership in which is determined by heredity, with a socially recognized advantage or disadvantage in status and privilege. Thus one caste is superior, or inferior, to another and individuals within it are consequently aided, or hampered, in their personal struggle for position, wealth, and social recognition. It is assumed when the word is used in this way that the persons in a society generally desire the same things. When the attainment of these goals is regularly helped or hindered by certain accidents of birth, castes develop and some individuals' opportunities for success are limited according to circumstances beyond their control. Caste is frequently regarded by people who use the word in this way as a symptom of enforced social inequality and as such is something to be eradicated or, at the very least, alleviated.

In its more precise meaning, caste refers to the social units within the highly complex social systems of India, Pakistan, and Ceylon. The caste system of these countries has existed for well over 2,000 years. It is in connection with this system that the Portuguese word *casta* attained its present wide application as English *caste*, and it is from this that the usage described above derived. The term used in the sense of a frozen class system is normative as well as descriptive, and reflects the powerful impression made by the actual caste system upon Western observers. As early as 1871, Sir Henry Maine wrote: "I am aware that the popular impression . . . is that Indian society is divided, so to speak, into a number of horizontal strata, each representing a caste. This is an entire mistake. . . . The true view of India is that, as a whole, it is divided into a vast number of independent, self-acting, organised social groups. . . ." (*Village Communities in the East and West*, pp. 56-57, London 1872) Since Sir Henry's day, caste as class has developed a literature and social theory of its own. The fact that

it did not offer an accurate view of Indian society was often neglected. Caste came to be used indiscriminately by Westerner and Indian alike to refer to an established social order and to a situation fostering social injustice. Many historical and sociological factors, particularly during the last several centuries, have, indeed, influenced caste in the subcontinent in the direction of class. Considering these changes, it is little wonder that the frame of reference has frequently been, and often still is, confused.

In contrast, the traditional view of caste is explicitly stated in treatises on Hindu law. The classic among these is the Code of Manu, generally dated between 200 B.C. and 100 A.D. but known to be founded on material of earlier date. In these and other sacred writings of Hinduism from the time of the Rig Veda (about 2000 B.C.) onward the word used to refer to caste is *varna* (Sanskrit *varna*). All of society is conceived as being composed of five interdependent divisions. The first four are the *varna*: (1) the Brahmins, or priests and scholars; (2) the Kshatriyas, or warriors and rulers; (3) the Vaisyas, or husbandmen, merchants, and artisans; and (4) the Sudras, or servants. The fifth division is composed of outcastes. According to the Hindu doctrine of rebirth, these are among the stages through which the soul passes. The first three *varna* are "twice born" because their members undergo an initiation ceremony not permitted to Sudras. They then wear the sacred thread as a sign of initiation, may study the Veda, and perform the sacraments. Sudras may be further distinguished as to whether or not they are "clean." It is important to note that the opposite of "clean" is not "dirty," but "unclean." Cleanliness in this sense refers to ritual only, and the unclean are those who are ritually polluting. Contact with them, whether direct or indirect, must be counteracted by ritual purification before the ordinary activities of life may be resumed. The *varna* are said to have originated from the deity: the Brahman sprang from the mouth, the Kshatriya from the arms, the Vaisya from the thighs, and the Sudra from the feet.

Though this account of caste, recorded in Sanskrit literature, is recognizably tied to Hindu doctrine, it is, in a strict sense, more characteristic of Brahmanism, for there are important Hindu sects which are opposed to much of Brahmanic philosophy, especially as related to caste practice. Nevertheless, Brahmanism has had an extremely important influence. Groups which fall outside of its direct orbit, such as tribal

groups and members of other religious faiths, can be seen to bear its imprint. As some writers have pointed out, there has been a gradual Sanskritization of even non-Hindu peoples and a general dissemination of Brahman ethics in the subcontinent.

The hereditary units of the caste system are known as *jāti* (Sanskrit *jāti*). They are many in number (between 2,000 and 3,000) and, according to Hindu doctrine, have arisen through the splitting of the *varṇa*. Whatever their origin, castes are present in all the major populations of the subcontinent. Throughout the period of historical Hinduism, there have been movements opposed to caste, such as Buddhism, Jainism, and Sikhism. The beliefs of Islam, which entered Sind as early as the 8th century, deny caste. And more recently, the attempts of followers of Gandhi to relieve the social position of the outcastes, or untouchables, have culminated in the absolute prohibition of untouchability in the Constitution of the Republic of India. Nevertheless, castes as social units have existed within groups denying the caste philosophy.

Despite their actual number, castes in any one locality are arranged in hierarchical order. Each person knows the relative position of his caste. Although certain positions may be in doubt at any one time, with a few castes claiming greater recognition and others accepting degradation, no caste is so low that it cannot refer to another below it in the hierarchy. One of the Brahman castes is generally at the top, but in some regions another, often a militaristic group, may claim ascendancy. Moslems (Muslims) may constitute a single caste in a dominantly Hindu population or, as in parts of Pakistan, Hindu and Moslem castes may interlace in the hierarchy. In the south of India, where caste regulations are exceptionally rigid, some castes are regarded as *Right Hand* and some as *Left Hand* castes. Not all castes in the south belong to these divisions, but the rivalries between them sometimes spread beyond them.

The lines between the castes are clearly demarcated by the rules of pollution. Most important among these are rules concerning the taking of food and water. Restrictions concerning *pakka* dishes, those cooked with ghee (clarified butter), are less severe than those for *kachcha* foods, which are cooked with water. Every caste knows those castes from which its members can accept food and those from which they cannot. If these rules are relaxed by the individual, it is always with the consciousness that he is doing so. Caste members may eat with each other, and marriages are also regularly arranged within the caste. Except in cases of hypergamy, where a bridegroom is sought from a higher-ranking caste, marriages are regularized within the caste. Each caste, however, contains *gotras*, or subcastes within which marriage would be regarded as incest. Marriage within caste must also be across *gotra*.

Castes regulate these matters themselves. They also have their own rituals, beliefs, and restrictions or privileges, concerning which no one has the right to dictate. Castes are thus largely autonomous, and they tend to be interdependent in practice since each has its own traditional areas of economic and social specialization. Caste names are often synonymous with the names of occupations such as washerman, goldsmith, barber, accountant, marriage go-between, vegetable

farmer, toddy tapper, or musician. Not all members of a caste need always follow its traditional specialization. But a consistent and recognized shift in either practice or specialization brings about a shift in caste definition and ranking. Such changes are still in many cases regulated by caste panchayats or councils. When caste panchayats were more powerful, they also always served as disciplinary bodies, intracaste disputes being handled by village or cross-caste councils.

Today, in the newly born nations of the subcontinent, caste regulations are subject to foreign—and potent—forces. Yet many aspects of the social order continue to encourage the formation, and the vitality, of hereditary, interdependent, and self-acting units within the greater whole of society. See also INDIA—*Anthropology and Sociology*, and *Religion and Philosophy*.

Bibliography.—For an example of the use of caste as class see Tumin, Melvin M., *Caste in a Peasant Society* (Princeton 1952). For a description of caste as social order see Hutton, John H., *Caste in India: Its Nature, Function and Origins* (Cambridge, Eng., 1952); and Ryan, Bryce, *Caste in Modern Ceylon* (New Brunswick, N. J., 1953). The last two contain extensive bibliographies.

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CASTEL GANDOLFO, *kās-tél' gān-dól'fō*, commune, Italy, in Roma Province, Latium; 13 miles southeast of Rome. It is famous as a summer resort of the popes. Built on the site of ancient Alba Longa supposedly founded by Ascanius, it is situated on the western edge of the Alban Hills, overlooking Albano Laziale, a crater lake. The area is rich in olive groves, orchards, and vineyards. During World War II the town was damaged in air raids.

The papal palace, in the Piazza del Plebiscito, was built in the 17th century on the ruins of an earlier castle and was designed by Carlo Maderno. Nearby, Villa Barberini, begun by Urban VIII, was built on the site of a villa belonging to the Roman emperor Domitian. Both the palace and the villa enjoy extraterritorial rights. Also in the Piazza del Plebiscito are the church of San Tommaso da Villanova (1661), which contains work of Giovanni Lorenzo Bernini, and a fountain executed by the same artist. The astronomical observatory, Specola Vaticana, was established in 1936. Pop. (1951) 4,212.

CASTEL SANT'ANGELO. See SAINT ANGELO CASTLE.

CASTELAR Y RIPOLL, *kās-tā-lār' è rè-pôl'y*, Emilio, Spanish orator and statesman: b. Cadiz, Spain, Sept. 8, 1832; d. San Pedro del Piñatar, Murcia Province, May 25, 1899. He was professor of history and philosophy at the University of Madrid from 1856 to 1865 and, after a short exile, from 1868 to 1875. An active republican leader, he was foreign minister from September 1873 to January 1874 during the short-lived republic that followed the abdication of King Amadeus. Later during the reign of Alfonso XII he became a member of the Cortes. He had advocated a separation of the church and the state.

He published *La civilización en los cinco primeros siglos del Cristianismo* (1859), *Historia del movimiento republicano en Europa*, 2 vols. (1873-1874), *Historia del descubrimiento de América* (1892), *Discursos parlamentarios y*

políticos (1871–1873), and biographies of Lord Byron and Fra Filippo Lippi. However, he is principally remembered for his oratory: Castelar was the most renowned orator of 19th century Spain.

CASTELEIN, kās-tē-līn', **Matthijs de**, Flemish poet and critic: b. Pamele, near Audenaarde, Belgium, 1485; d. there, April 1550. A member of the Rederijkerskamers, or Chambers of Rhetoric, he was the acknowledged lawgiver for all Dutch grammarians; he set the pattern in his *Const van Rhetoryken* (completed 1548; published 1555), the first treatise on Flemish versification which also included some ballads and songs. He wrote over 100 plays, one of which was *Historie van Pyramus en Thisbe*.

CASTELFRANCO, Giorgione da. See GIORGIONE.

CASTELFRANCO DELL'EMILIA, kās-tēl-frāng'kō dēl-lā-mē'lyā, commune, Italy, in Moderna Province; about 7 miles southeast of Moderna. In 1628 Urban VIII erected, just outside the city on the Bologna frontier, a large fort which later became a prison. The town is the approximate site of the ancient Forum Gallorum where Octavian defeated Mark Antony in 43 B.C. Milk products, wine, and paper are produced. Pop. (1951) 19,753.

CASTELFRANCO VENETO, kās-tēl-frāng'kō vā'nā-tō, commune, Italy, in Treviso Province; about 15 miles west of Treviso. The city is surrounded by medieval walls. Il Giorgione, who was born here, painted the altar-piece, "Madonna with St. Francis and St. Liberale," in the local cathedral. In 1805, near the Musone River crossing, the French defeated the Austrians. Manufactures include textiles, leather goods, pharmaceuticals, alcohol, and electrical equipment. Pop. (1951) 19,984.

CASTELLAMMARE DEL GOLFO, kās-tēl-lām-mā'rā dāl gōl'fō, seaport, Sicily, in Trapani Province; about 5 miles northwest of Alcamo. The port is located on a fertile coastal plain on the Gulf of Castellammare. It is a watering place and has small tuna fisheries. Pop. (1951) 18,740.

CASTELLAMMARE DI STABIA, kās-tēl-lām-mā'rā dē stā'byā, seaport, Italy, in the Province of Napoli; about 16 miles southeast of Naples, to which it is connected by railroad and highway; it extends for over a mile along the southeast end of the peninsula of Sorrento. Because of its beautiful location, its sea bathing facilities, and the variety of its mineral waters, used since Roman times, it is much visited by tourists. Vineyards and fruit and vegetable orchards cover its pleasant surroundings. The local shipyards, established by the Bourbons in 1783, are one of the oldest in Italy; after 1900 they were enlarged and modernized. Macaroni, cheese, alcohol, rope, canned goods, and olive oil are the chief products; fishing is also important. There is a 16th century cathedral, a municipal palace, and the restored remains of the 13th century castle of Frederick II. The Villa Quisisana, built on a height by the Angevins, is now a hotel and offers a gorgeous view of the bay. The town lies on the site of ancient Stabiae

which was destroyed by the eruption of Mount Vesuvius in 79 A.D.; near here Pliny met his death. In 1779 the French, under Jacques E.J.A. Macdonald, defeated the British and Neapolitans. Pop. (1951) 56,115.

CASTELLANA, kās-tāl-lā'nā, commune, Italy, in Bari Province; 16 miles southeast of Bari and about 7 miles from the Adriatic. It is located in the fertile Apulia plateau where olives and vines are grown; macaroni and textiles are manufactured. Pop. (1951) 13,850.

CASTELLANE, kās-tēl-lān, **Comte Esprit Victor Elisabeth Boniface de**, French marshal: b. Paris, France, 1788; d. Lyon, 1862. He entered the army in 1804 and took part in most of Napoleon's campaigns. In 1815 he became a colonel of the hussars of the royal guard and following the siege of Antwerp (1832) was made lieutenant general. However, he opposed the revolution, lost his command, and consequently went over to Louis Napoleon for a short time. After his return, he was made commander of Lyon in 1850 and two years later became marshal of France. His *Journal* was published in 1897.

CASTELLANI, kās-tāl-lā'nē, **Sir Aldo**, Italian bacteriologist: b. Florence, Italy, Sept. 8, 1875. He studied at the universities of Florence and Bonn and at the London School for Tropical Medicine. Working in Uganda with two British physicians, Sir David Bruce and David Nunes Nabarro, he discovered in 1903 *Trypanosoma gambiense*, the organism causing sleeping sickness, and in 1907 described *Treponema pertenue* as the cause of yaws. In 1926 and 1932 he was professor of tropical medicine at Tulane and Louisiana State universities, respectively. He has published several books, among which is *A Manual of Tropical Medicine* (with Albert John Chalmers, 1910), and edited the *Journal of Tropical Medicine*. He developed Castellani's absorption test, and Castellani's disease, a bronchial spirochetosis, is named for him. In 1929 he was knighted in England and he has received numerous honors in Italy. During the Ethiopian campaign he was surgeon general for the Italian forces.

CASTELLESSE, Adriano. See ADRIAN OF CASTELLO.

CASTELLI, kās-tēl'lē, **Benedetto**, Italian mathematician and physicist: b. Brescia, 1577; d. Rome, c.1644. He entered the Benedictine Order and was abbot at Monte Cassino. A pupil of Galileo, he became a successful professor of mathematics at the University of Pisa and at the Collegio della Sapienza, Rome. He distinguished himself in the field of hydraulics and was consulted by Urban VIII in his projects for the regulation of Italian rivers. Torricelli was one of his pupils. *Della misura delle acque correnti* (Rome 1628), his principal work, was translated into English in 1660 and into French in 1664.

CASTELLI, kās-tēl'ē, **Ignaz Franz**, Austrian dramatist: b. Vienne, Austria, March 6, 1781; d. there, Feb. 5, 1862. As a writer of patriotic songs, he gained considerable recognition with the publication of his *Kriegslied für die*

österreichische Armee. In 1811 he was appointed court poet to the Kärntner Theater in Vienna, but in 1815 went to Paris as secretary to Count Cavriani. Upon his return he resumed his former position.

He composed librettos for Joseph Weigl's *Die Schweizerfamilie* (1809) and Schubert's *Die Verschworenen* and adapted Meyerbeer's *Huguenots*. He founded *Allgemeiner musikalischer Anzeiger* and was its editor from 1829 to 1840. As a popular dramatist, his numerous plays were effective in their satirization of Viennese foibles. His last publication was *Memoiren meines Lebens*, 4 vols. (1861–1862).

CASTELLIO, kās-těl'ī-ō, or **CASTALIO**, kās-tā'li-ō, **Sebastianus** (Fr. SÉBASTIEN CHÂTELLON, shā-tē'yōn, or CHÂTEILLON, shā-tā'yōn), French Protestant theologian and humanist: b. Saint-Martin-du-Fresne, Ain, France, 1515; d. Basel, Switzerland, Dec. 29, 1563. At the invitation of Calvin he settled in Geneva where he became rector of the college in 1541. But because of differences regarding questions of religious belief, especially his erotic interpretation of the Song of Solomon, he was banished and settled in Basel in 1545 where he spent the remainder of his life. In 1553 he became professor of Greek at the university, and the following year wrote, under the pseudonym of Martin Bellie, his famous condemnation of the execution of Servetus in both Latin and French, *De haereticis et Traktat des hérétiques*. He made two remarkable translations of the Bible, one in Latin, the other in French.

CASTELLO, kās-těl'lō, **Giovanni Battista** (called IL BERGAMASCO, ēl bār-gā-mās'kō), Italian painter, sculptor, and architect: b. at or near Bergamo, Italy, c.1509; d. Madrid, Spain, 1569, although 1579 is sometimes quoted. He belonged to the school of Genoese painters, but apparently was unrelated to other artists of the same name. Invited to Madrid as architect of the royal palaces by Philip II, Castello assisted in the restoration of the Alcázar and the construction of the Escorial.

CASTELLON DE LA PLANA, kās-tā-[l]yōn' dā lā plā'nā, province, Spain, on the Mediterranean coast; 2,579 square miles. The northern and western mountainous regions slope down to the fertile coastal area, which is still irrigated by canals dating from Moorish times; the province is drained by short torrential rivers. Essentially an agricultural district, its products include grapes, olives, grain, fruits, and vegetables, especially oranges and rice; there are few minerals. Textiles, porcelain, cement, soap, and paper are the principal manufactures; sericulture and hemp processing are also carried on. El Grao de Castellón and Vinaroz are the two important ports. Pop. (1950) 325,091.

CASTELLON DE LA PLANA, city, Spain, capital of the province of the same name; 40 miles north-northeast of Valencia and 200 miles east-northeast of Madrid. It is located in a fertile irrigated plain, producing citrus fruit, olive oil, wine, cereals, and rice. Cement, sandals, and tiles are manufactured. The town is connected by railroad with its port, El Grao de Castellón, only three miles to the east; oranges, hemp, and tiles are exported. The present town

is entirely modern; the original town, now in ruins, occupied a hill to the north. James I of Aragon wrested it from the Moors in 1233. Later it suffered under the *comuneros'* rising in the 16th century and again in the 19th century during the Peninsular War. In 1938 it fell to the forces of Francisco Franco during the Spanish Civil War. Pop. (1950) 53,331.

CASTELLORIZO, island, in Mediterranean Sea. See KASTELORRIZON.

CASTELNAU, kās-těl-nō', **COMTE DE** (FRANCIS DE LA PORTE), French traveler: b. London, England, 1812; d. Melbourne, Australia, Feb. 4, 1880. He traveled extensively in Canada, the United States, and Mexico, and under the protection of the French government undertook an exploration of South America in 1843. After his return to France in 1847, he published *Expédition dans les parties centrales de l'Amérique du Sud* (1850–1861). Castelnau later traveled in Arabia and was successively consul at Bahia, the Cape of Good Hope, and Singapore. At the time of his death he was consul general at Melbourne.

CASTELNAU, Michel de (SIEUR DE LA MAUVISSIÈRE), French soldier and diplomat: b. Mauvissière, Touraine, France, c.1520; d. Joinville, 1592. Of a noble family, he traveled in Italy as a youth and fought in Piedmont under Charles de Cossé, the future Marshal de Brissac. He conducted important diplomatic missions in Switzerland, the Netherlands, Germany, England, and Rome, and fought in the wars of religion from 1560 to 1565. In the latter year he was sent as envoy to Scotland, and in 1572 to England. For a decade from 1575 he was ambassador at the court of Queen Elizabeth, during which time he endeavored to negotiate a marriage between the queen and the duc d'Alençon. His *Mémoires* cover only the period 1559–1570.

CASTELNAU, kās-těl-nō', **VICOMTE Noël Marie Joseph Édouard de Curières de**, French general: b. Saint-Affrique, France, Dec. 24, 1851; d. near Toulouse, March 19, 1944. He entered the Saint-Cyr military school in 1869, served as an officer in the Franco-Prussian War, rose through the successive ranks, studied at the École de Guerre, and was promoted general in 1906. He became chief of staff of Gen. Joseph Jacques Césaire Joffre when, in 1913, the latter was designated as commander in chief in case of war. At the beginning of World War I, Castelnau was placed in command of the army of Lorraine, charged with the defense of Nancy. His forces, drawn up across the gap of Nancy to prevent the army of the crown prince of Bavaria from turning the Allied front, resisted a fierce assault by the Bavarians against the heights of Grand Couronné (Sept. 6 to 12, 1914). By his successful defense of Nancy, Castelnau contributed directly to the victory of the Marne. In 1915, he commanded the French offensive in Champagne and was made chief of the General Staff under the commander in chief. In 1916, he was sent by Joffre to Verdun and saw clearly the need for defending that fortress on the right bank of the Meuse. His recommendations were instrumental in the decision to hold Verdun. After the war, General Castelnau, who was a devout Catholic and an extreme conservative, be-

came active in rightist politics. He served as a deputy in the National Assembly from 1919 to 1924.

CASTELNAU, Pierre de, French ecclesiast: d. Jan. 15, 1208. Archdeacon of Mauguellonne, near Montpellier, he was sent in 1199 by Pope Innocent III, with two Cistercian assistants, to the south of France on a mission to convert or extirpate the Cathari heretics there, who were under protection of Count Raymond VI of Toulouse. After three years of efforts, the archdeacon took the Cistercian habit at Fontfroide, near Narbonne. Thereafter the pope confirmed him as apostolic legate and first inquisitor, and he resumed his labors. At a last stormy interview with Raymond, Castelnau excommunicated the uncooperative count. Shortly afterward one of Raymond's squires, thinking to please him, murdered the legate at an inn on the Rhone. The pope was so enraged at this crime that he proclaimed the "crusade" against the Albigenses (q.v.) conducted with such barbarity.

CASTELNAUDARY, kās-tě'ñō-dā-rě', commune, France, in the Department of Aude, on a height above the Canal du Midi; 22 miles west-northwest of Carcassonne. It was built by the Visigoths on the site of a former town and was called Castrum Novum Arianorum from which its present name has been corrupted. It suffered greatly during the crusade of Simon IV de Montfort l'Amaury against the Albigenses and was captured in 1212; in 1355 it was almost totally destroyed by Edward the Black Prince. It is also famous for the battle fought beneath its walls on Sept. 1, 1632, the troops of Louis XIII defeating Gaston d'Orléans. The town has large grain and flour markets and does a considerable trade in fruit, wool, wine, and cattle; various forms of tiles and earthenware products are manufactured. Saint-Michel, a 14th century church, is located here. Pop. town (1946) 8,073.

CASTELNUOVO, CONTE DI. See CARMAGNOLA.

CASTELNUOVO, kās-tāl-nwō'vō, **Enrico**, Italian novelist: b. Florence, Italy, Feb. 16, 1839; d. Venice, Jan. 22, 1915. He spent the greater part of his time in Venice which set the atmosphere for most of his novels. Considered among his best works are *Il professore Romualdo* (1878), *Reminiscenze e fantasie* (1885), and *Il fallo di una donna onesta* (1897).

CASTELNUOVO-TEDESCO, **Mario**, Italian composer: b. Florence, Italy, April 3, 1895. Having studied composition with Ildebrando Pizzetti and piano with Edgardo del Valle de Paz, at the age of 15 he wrote a piece for the piano, *Cielo di settembre*. Among his other works are *La Mandragola* (1926), an opera, *Le Danse del Re David* (1925), *Concerto Italiano* (1924), for the violin and modeled on Italian folksongs, and *Concerto* (first performed 1928), for the piano. His music is programmatic and is harmonic rather than contrapuntal; the shorter forms, especially songs, were his specialty. He made his home in the United States.

CASTELO BRANCO, kāsh-tě'lōō brā'ng'-kōō, **Camilo** (also CAMILLO CASTELLO BRANCO; VISCONDE DE CORREIA-BOTELHO, kōōr-rā'yā bōō-

tā'lyōō), Portuguese novelist and poet: b. Lisbon, Portugal, March 16, 1825/1826; d. São Miguel de Seide, Minho, June 1, 1890. Orphaned at an early age, he was taken to a village in Tras-os-Montes by his sister where he led an erratic life. He studied for several professions but after a short journalistic career he took minor orders. His restless nature, however, prevented his adherence to this course, and he abandoned it to resume a feverish literary activity. In 1885 he was created a viscount in recognition of his literary accomplishments. Five years later, having lost his sight and suffering from a nervous disease, he committed suicide. He was particularly known for his novels of manners such as *Amor de perdição* (1862) and *Amor de salvação* (1864).

CASTELO BRANCO, kāsh-tā'lōō vrā'ng'-kōō, commune, Portugal, capital of Beira Baixa Province; 114 miles northeast of Lisbon. It is an agricultural trading and processing center; manufactures include woolen goods, candles, pottery, and furniture. Its episcopal palace with its formal gardens is of interest. Pop. (1940) 9,293.

CASTELVETRANO, kās-tě'l-vā-trā'nō, commune, Sicily, in the Province of Trapani; 29 miles south-southeast of the town of Trapani, on a rocky hill about 8 miles from the sea. Wine is the chief agricultural product, and furniture is the most important manufacture. The ruins of the Greek city Selinus are nearby. Pop. (1951) 30,195.

CASTELVETRO, kās-tāl-vā'trō, **Lodovico**, Italian critic and philologist: b. Modena, Italy, about 1505; d. Chiavenna, Feb. 21, 1571. His works include a translation and commentary on Aristotle's *Poetics* (1570), and expositions on Cicero's *Rhetorica* (1553), Dante, and Petrarch.

CASTI, kās'tě, **Giovanni Battista**, Italian poet and adventurer: b. Acquapendente, Italy, Aug. 29, 1724; d. Paris, France, Feb. 5, 1803. Having studied and taught at the seminary in Montefiascone, he became court poet in Florence in 1764. There he met Emperor Joseph II, who liked his wit and personality and took him to Vienna in 1769. Casti went to Russia in 1778 and was received by Catherine II with great honors. This, however, did not prevent him from satirizing her in his *Poems Tartaro* (1787), for which Joseph II exiled him. He returned, however, to become poet laureate from 1790 to 1796, finally settling in Paris in 1798. The first to write truly original comic operas in Italian, Casti's fame rests mainly on his *Novelle Galanti* (1793, corrected edition), a collection of 48 short stories in verse. Most are of a licentious turn, as in his poem *Animali Parlanti* (1802), in which, through imaginary antediluvial animal characters, he symbolizes the conflict between the conservative regimes and the revolutionary ideas to which he was sympathetic.

CASTIGLIONE, DUC DE. See AUGEREAU, PIERRE FRANÇOIS CHARLES.

CASTIGLIONE, kās-tě-lyō'nā, **CONTE Baldassare**, Italian diplomat and writer: b. Casatico, near Mantua, Italy, Dec. 6, 1478; d. Toledo, Spain, Feb. 7, 1529. He studied in Mantua and

at the age of 18 entered the service of Duke Ludovico Sforza. In 1499 he became attached to the service of Francesco Gonzaga, duke of Mantua, whom he accompanied on an unsuccessful campaign in Spain. Five years later he transferred to the small but brilliant court of Guidobaldo II, duke of Urbino. Here in a relaxed but intellectual atmosphere he was able to devote much of his time to literary pursuits. He served not only as an accomplished courtier but also as a soldier and as an ambassador, and in 1506 was sent on a mission to Henry VII of England where he received the Order of the Garter for his duke. In Rome, he met and befriended Raphael, whose fine portrait, now in the Louvre, clearly reveals his personality. In 1524 Pope Clement VII sent Castiglione as papal nuncio to the court of Emperor Charles V who later offered him the bishopric of Ávila. His Spanish mission is generally considered a failure, since it did not effect the desired reconciliation nor did it prevent the sack of Rome by the Bourbons in 1527; but at least part of the blame should go to the wavering attitude of the pope himself.

Castiglione was a true humanist and one of the most representative figures of the Italian Renaissance from an ethical, literary, and political viewpoint. His fame rests chiefly on his prose dialogue, *Il Cortegiano* (q.v.), in which he describes the true Italian gentleman of his time; it is considered one of the most important works of the 16th century. Sometimes known in Italian as *Il Libro d'Oro*, it was first printed by the Aldine Press of Aldo Manutius in 1528. The first English translation, made by Sir Thomas Hoby as *The Courtier of Count Baldessar Castilio* (1561), had a considerable influence on Sir Thomas Wyatt, Earl of Surrey, Sir Philip Sidney, and Edmund Spenser. Castiglione also wrote poems in Italian and Latin.

Consult Cartwright, Julia, *Baldassare Castiglione* (London 1908) for reference and bibliography.

CASTIGLIONE, CONTE Carlo Ottavio, Italian scholar: b. Milan, Italy, 1784; d. Genoa, April 10, 1849. He is best known for his edition of some of the fragments of Ulfilas' Moeso-Gothic Bible which were discovered in 1817 by Cardinal Mai. Castiglione also published a work in 1826 in which he sought the origin and history of the Barbary towns whose names appeared on Arabic coins.

CASTIGLIONE, Giovanni Benedetto (called IL GRECHETTO), Italian painter and etcher: b. Genoa, Italy, about 1610; d. Mantua, 1665.¹ A pupil of G. B. Paggi and G. A. De Ferrari, he was also influenced by Bernardo Strozzi, another leading painter of the school of Genoa. He was active in several centers but spent most of his life after 1639 at Mantua, where he was court painter of the duke of Mantua. Best known as a painter of animals, he chose religious and mythological subjects which allowed him to include large numbers of animals, such as Noah's ark, Abraham's journey, the nativity of Christ, pastoral myths and sacrifice scenes, as in the handsome *Ancient Sacrifice* in the Palazzo Durazzo in Genoa. His brother Salvatore and his son Francesco worked in his shop, the latter succeeding him as court

painter at Mantua. Castiglione's etchings are also well known, their free drawing and handling of light suggesting contact with Rembrandt's etchings.

Consult Delogu, G., *G. B. Castiglione detto Il Grechetto* (Bologna 1928).

CASTIGLIONE DELLE STIVIERE, kās-tē-lyō'nā dāl-lâ stē-vyâ'râ, commune, Italy, in Mantova Province; 22 miles northwest of Mantua. Located in the fertile Po plain, it is a busy agricultural market town; silk spinning is the principal industry. In 1404 it came under the Gonzaga, lords of Mantua, and was the seat of the principality under a branch of the family until early in the 18th century. Near here Napoleon won a decisive victory over the Austrians under Dagobert Siegmund von Wurmser on Aug. 5, 1796. Pop. (1951) 9,131.

CASTIGLIONE OLONA, kās-tē-lyō'nâ ôlô'nâ, commune, Italy, in the Province of Varese; 27 miles northwest of Milan. The principal manufactures are cotton goods, textile machinery, and combs. The town is most famous for its frescoes by the 15th century Florentine artist Masolino da Panicale; the Collegiate Church, built by Cardinal Branda da Castiglione, contains the fresco of the life of Christ, and the life of St. John the Baptist is portrayed in the Baptistry. Pop. (1951) 3,643.

CASTILE, kās-tēl' (Span. CASTILLA, kās-tē'-[l]yâ), region and former kingdom, Spain, traditionally divided into Old Castile (Castilla la Vieja) and New Castile (Castilla la Nueva), of which Burgos and Toledo were respectively the capitals. Burgos remains the capital of the modern region of Old Castile, but Madrid has replaced Toledo as capital of New Castile. The name "Castile" seems to have been derived from the numerous *castillos* (*castella* in Latin) constructed by nobles in that territory for defense against Moorish incursions during the Christian reconquest of Spain.

Occupying the geographic center of the Iberian Peninsula, New Castile included the Moorish kingdom of Toledo. Its present-day regional area, approximately that of the historic area, includes the five provinces of Ciudad Real, Cuenca, Guadalajara, Madrid, and Toledo. On the north it is bordered by Old Castile and Aragón; east by Aragón and Valencia; south by Murcia and Albacete; and west by Extremadura. It has an area of 27,933 square miles and a population of 3,559,809 (Dec. 31, 1950). The largest city is Madrid with a population of 1,618,435 (1950) and the next largest is Toledo (40,243). All the other cities have populations of less than 35,000.

Old Castile, adjoining New Castile to the north, is separated from it by the mountain barriers of the Sierra de Gredos, Sierra de Guadarrama, and Sierra de Ayllón. Historically its confines were even more vague and shifting than those of New Castile. In its present-day extent it comprehends the six provinces of Santander, Burgos, Logroño, Soria, Segovia, and Ávila. The region is boot-like in form, with Ávila the toe, Soria the heel, and the Bay of Biscay littoral of Santander Province the top. The largest city is Santander (102,464) and next largest Burgos (74,063), the regional capital. Few other cities, apart from provincial capitals, have populations in excess of 5,000.

¹ These dates have been regarded by modern scholarship as more nearly correct, although 1616-1670 have been repeated many times.

The greater part of Spain's central plateau is in Castile. The average elevation above sea level in New Castile is about 1,970 feet, while in Old Castile—the maritime province of Santander excepted—it is about 2,300 feet, and in the provinces of Burgos and Soria the elevation rises to 2,950 feet. Here are the headwaters of the Duero, Tagus, Guadiana and Júcar rivers. The plains of Castile are hemmed in on all sides by mountain ranges. The climate is continental—dry and very cold in winter, with temperatures recorded to -64°F. ; while summer temperatures rise to 117.6°F. Winter snowfalls are heavy and the snows on the cordilleras last until April.

Largely arid and climatically unfavorable to agriculture, Castile is in the main a pastoral land. However, there is cultivation of cereals—chiefly wheat and barley, also potatoes, beans, and grapes. In southeastern New Castile the famous Valdepeñas, Tomelloso, and other wines are produced. Olive production is almost nonexistent, and no citrus fruit trees can be grown due to climatic conditions. The Castilian plain is treeless, ruthless felling having destroyed its ancient groves. What little forest growth remains in New Castile is in the mountainous parts of Cuenca where there are fairly extensive pine stands. On the other hand, in Old Castile there are numerous and extensive pine forests, especially in Soria and Segovia, which furnish large supplies of resin. This forest industry, with cattle raising, cheese-making, viticulture (in Burgos, Soria, and Ávila), vegetable and fruit canning in Logroño, cloth weaving for home consumption, wood exploitation (in Soria, Burgos, and Segovia), and milling, complete the picture of Old Castile's industrial activity.

In the southern part of Ciudad Real Province (New Castile) coal, mercury, and other minerals are mined in the vicinity of Puertollano and Almadén.

History.—According to tradition the first independent count of Castile was Fernán González (c.910–970). Before his time Castile had been ruled by vassals of the kings of Asturias and León who may have held the title of count. In 940 Fernán González revolted against King Ramiro II of León (r. 931–951), but was defeated and imprisoned. Several years passed before he recovered his liberty and countship. However, from 950 his name appears on Castilian documents without mention of the king of León, from which it is inferred that by then he had secured Castile's independence. A skillful politician as well as a warrior, he styled himself "Count by the Grace of God." In 955 he defeated the Moors at San Esteban de Gormaz.

The countship passed through various hands until it was seized by Sancho III, king of Navarre (r. 1000–1035), whose queen was a sister of Count García Sánchez of Castile, after the latter's murder in 1028. Sancho III also held the lordship of Aragon and conquered León. On adding Castile to his dominions, he raised it to the dignity of a kingdom and added to his own titles that of King Sancho I of Castile. In 1035 the crown of Castile passed to his second son who ruled as Ferdinand I (the Great). Four years later Castile and León were united. The two realms were separated in 1065, but in 1072 were reunited by King Alfonso VI (Alfonso el Bravo) of León who ruled Castile as Alfonso I. Subsequently the kingdoms were again separated but were finally reunited in 1230 under Ferdinand III (el Santo)

of Castile. Other noted kings of Castile include Alfonso X (el Sabio) and Pedro the Cruel. Isabella of Castile married Ferdinand of Aragon in 1469 and acceded to the throne of Castile in 1474, her husband becoming king of Aragon in 1479. Thenceforth Castile and Aragon were united in the Spanish monarchy. See also SPAIN—History.

CASTILHO, kâsh-tē'lyōō, VISCONDE Antônio Feliciano de, Portuguese poet: b. Lisbon, Portugal, Jan. 28, 1800; d. there, June 18, 1875. Although almost blind, he received his education with the help of his brother Augusto and later studied law at the University of Coimbra. His first poetical composition, *Cartas de Echo e Narciso* (1821), published while he was a student, won him great celebrity. He excelled in pastorals, to which class *A Primavera* (1822) and *Amor e Melancolia* (1822) belong. He was a leader of the romantic movement in Portugal. Among his other literary accomplishments are *A Noite do Castello* (1836), a translation of Ovid's *Metamorphoses* (1841), and a free adaptation of Shakespeare's *Midsummer Night's Dream* and Goethe's *Faust*.

CASTILIAN DIALECT, the official literary tongue of Spain. See SPAIN—Language.

CASTILLA, kâs-tē'yâ, Ramón, Peruvian soldier and politician: b. Tarapacá, Chile, Aug. 27, 1797; d. Arica, May 25, 1867. He fought in the war for independence (1820–1826) and in the civil war (1841–1845). In 1837, under President Agustín Gamarra, he was minister of war. Elected president of Peru in 1845, he was succeeded in 1851 by José Rufino Echenique, but overthrew him in 1855; three years later he was again elected to the presidency. He introduced several important reforms, such as the abolition of slavery (1856) and the promulgation of a new constitution (1860) which remained until 1920. In 1862 he was succeeded by Miguel San Román. See also PERU—History.

CASTILLA ELASTICA (known also as the MEXICAN RUBBER TREE, PANAMA RUBBER or ULE RUBBER), a member of the family Moraceae (Mulberry family), it is the principal source of rubber in Mexico and Central America. A fast-growing tree, especially when young, this species is characterized by large, oval, coarse leaves (18 x 6 inches), monoecious flowers, and fleshy, orange-red fruits (2 inches in diameter), composed of numerous drupes. The milky juice, which is obtained by tapping, coagulates in the air, a process often hastened by adding various plant substances. This crude rubber was well known to the early inhabitants of Mexico who made balls and other articles from it. It is also used for waterproofing of coats, hats, shoes, and other things. Cultivation of this and other species of the same genus, although attempted on a large scale, has not been so successful as that of other rubber-bearing plants, mainly because of the smaller yield and the difficulties encountered in tapping operations. The Mexican rubber tree is also used for medicinal purposes, and its bark is supposed to be a source of paper. Other species of the genus yield rubber exported from various Central American countries and especially Brazil. Although widely used, *Castilloa* is an incorrect version of the generic name.

CASTILLEJO, kās-tē-lyě'hō, **Cristóbal de**, Spanish poet: b. Ciudad Rodrigo, Salamanca Province, Spain, c.1490; d. Vienna, Austria, c.1550. Before the age of 15 he entered the service of Archduke Ferdinand, younger brother of Charles V, as a page. Upon the king's death in 1515 he became a monk at San Martín de Valdeiglesias where he remained until 1525 when he was made Archduke Ferdinand's secretary. While living in Vienna he led a rather licentious life despite his indescribable hardships. Endeavoring to remedy his plight, Charles V assigned him a 2,000-florin pension in 1548, but the poet died soon afterward. Although Castillejo does not rank among the lyricists of his time, few surpass his satiric venom and festive vein. Writing in the traditional style, facile, elegant, he satirized poets like Boscán Almogaver and Garcilaso de la Vega who were introducing the style and satirical combinations of the Italian poets. In addition to his versions of the Latin poets, he wrote numerous songs, ballads, and religious and moral works. Among his better known works are *Sermón de Amores*, *Diálogo . . . de las mujeres*, and *Diálogo entre el autor y su pluma*, all of which are examples of his charming simplicity and delightful wit.

CASTILLEJOS, MARQUÉS DE LOS. See PRIM Y PRATS, JUAN.

CASTILLO, Bernal Díaz del. See DIAZ DEL CASTILLO, BERNAL.

CASTILLO, kās-tē'yō, **Ramón S.**, Argentine statesman: b. Catamarca, Argentina, Nov. 20, 1873; d. Buenos Aires, Oct. 12, 1944. The son of Rafael and Maria B. Castillo, he studied at the National University in Buenos Aires and became secretary of the Commercial Court of the City in 1893. Thereafter he held various legal and pedagogical positions. He entered politics in 1930 and was elected senator from Catamarca in 1932, serving until 1935. He successively held the posts of minister of public instruction and minister of the interior, and became vice president of Argentina and president of the senate in 1938. When President Roberto M. Ortiz resigned in 1940 because of ill health, Castillo became acting president, and president, governing by decree, after April 1941. Extremely conservative, he alienated Argentina from her sister republics by withholding cooperation in the United Nations in accordance with his policy of "prudent neutrality." He authorized repressive measures against the Argentine press, restricted labor, and curtailed civic liberties.

CASTILLO DE SAN MARCOS, national monument. See NATIONAL PARKS AND MONUMENTS.

CASTILLO NAJERA, kās-tē'yō nā'hā-rā, **Francisco**, Mexican physician and diplomat: b. Durango, Mexico, Nov. 25, 1886. The son of Romualdo Castillo and Rosa Najera, he received his degree in medicine at the University of Mexico in 1903 and did further work in Paris and Berlin. He was director of the Juárez Hospital, Mexico City, 1918-1919, and in the latter year was professor of urology. In 1920 he became director of the army medical school and from 1921 to 1925 was a member of the international commission for the campaign against yellow fever.

In 1922 Castillo Najera began his diplomatic career as minister to China, followed by the same position in Belgium (1927-1930), Holland (1930-1932), and France (1933-1935). He was ambassador to the United States from 1935 to 1945, at which time he returned to Mexico to become minister of foreign affairs. He served as Mexican delegate to the United Nations and in June and July 1947 was president of the Security Council.

CASTILLO SOLORZANO, kās-tē'lyō sâl-lôr'thā-nō, **Alonso de**, Spanish author: b. Torrellas, Spain, c.1584; d. probably at Zaragoza, about 1647. Although he published two volumes of humorous verse, *Donaires del Parnaso*, he is chiefly remembered as a novelist. Two of his works, *La niña de los embustes* (1632) and *Aventuras del bachiller Trapaza* (1634), were used in *Gil Blas* by Lesage. He also wrote several plays which were widely popular.

CASTILLON, kās-tē-yôn', or **CASTILLON-ET-CAPITOURLAN**, kās-tē-yôn' nā kà-pē-tōor-lân', commune, France, in the Department of Gironde, on the Dordogne River; 26 miles east of Bordeaux. Beneath its walls, on July 17, 1453, was fought the battle which ended the Hundred Years' War, when the English met a defeat which resulted in the return of Gascony and Guyenne to France after being held by the English for nearly 300 years. Part of the battle was described by Shakespeare in the fourth act of *King Henry VI, Part I*. Pop. (1950) 3,071.

CASTINE, kās'-tēn, **BARON Vincent de**, French soldier: b. Oleron, France, 1650; d. there, about 1722. He went to Canada in 1665, established a mercantile house at Penobscot (now Castine), Me., in 1687, and married the daughter of the Penobscot chief. In 1696 he captured Pemaquid. He assisted in the defense of Port Royal in 1706 and was wounded there the following year. His son, who succeeded him in command of the Penobscots, was made prisoner and taken to Boston in 1721.

CASTING, the running of melted metal into a mold, so as to produce an object in metal having the shape of the mold. The casting of type is done by composing machines (q.v.). See **CAST STEEL**; **FOUNDRY PRACTICE**; and **IRON—Cast Iron**.

CASTING AWAY OF MRS. LECKS AND MRS. ALESHINE, *The*, a humorous story by Frank R. Stockton, published in 1886. Two widows, one with a son in business in Japan, decide to see the world and set out for the Orient. On the way they are shipwrecked but escape in a leaky boat which, however, finally sinks under them. They make their way to a small coral island with their companion, Mr. Craig, who tells the story. On the island they take possession of the summer place of the Dusantes and make themselves at home. Ruth Edgerton, a missionary's daughter, and her father then join the party. The two old ladies decide, among other things, that Mr. Craig should marry Miss Edgerton, and in their own inimitable way they accomplish their end. Before leaving the island, they write a note to the owners of the house where they temporarily stayed. In *The Dusantes* (1888), a continuation of the tale, the widows and the Dusantes meet back in the states under exciting circumstances.

Representative of Stockton's unique method of storytelling, these absurd tales are told in a gravely realistic manner.

CASTLE, kàs'1, **Egerton**, English novelist: b. London, England, March 12, 1858; d. there, Sept. 20, 1920. He was educated in Paris, Glasgow, and at Cambridge. After a brief military career he turned to journalism, and was publisher of the *Liverpool Mercury*. From 1885 to 1894 he served on the staff of the *Saturday Review*. Among his numerous works are *Consequences*, a novel (1891), *Saviolo*, a play (1893, co-author W. H. Pollock), *Young April*, a romance (1899), *The Star-Dreamer* (1903), *Panther's Cub* (1910), *Wolf Lure* (1917), and *New Wine* (1919). A great number of his novels were written jointly with his wife, Agnes Sweetman Castle (d. 1922), including *The Pride of Jennico* (1898; later dramatized) and *The Bath Comedy* (1899; dramatized as *Sweet Kitty Bellairs*).

CASTLE, **Vernon** (originally **VERNON BLYTHE**), English aviator and dancer: b. Norwich, England, May 2, 1887; d. Fort Worth, Texas, Feb. 15, 1918. He was educated for civil engineering at Birmingham University. In 1906 he came to the United States and the following year made his theatrical debut in *The Girl Behind the Counter*. His outstanding talent, however, was dancing; he originated the one-step, turkey-trot, and Castlewalk. After his marriage in 1911 to Irene Foote of New Rochelle, N. Y., he opened a dancing school and devoted himself entirely to exhibitions and teaching; he became very popular in Paris in 1912. In 1915 he took up aviation, received his pilot's certificate in the United States, and in February 1916 enlisted in the Royal Flying Corps. He served in France and during the next year made about 200 missions over enemy lines. In 1918 he was transferred to Fort Worth, Texas, as an instructor but was killed in a collision with a cadet. He was known not only for his dancing but won the respect of military officers for his spectacular flying.

CASTLE, **William Ernest**, American zoologist: b. Alexandria, Ohio, Oct. 25, 1867. He studied at Denison University and in 1894 received his Ph.D. from Harvard. After serving in various teaching capacities at Ottawa (Kans.) University, University of Wisconsin, and Knox College, he became assistant professor of zoology at Harvard in 1903, being promoted to a professorship, 1908–1936. He wrote numerous articles on embryology, animal morphology, and heredity; his books include *Heredity in Relation to Evolution and Animal Breeding* (1911), *Genetics and Eugenics* (1912), *Genetics of Domestic Rabbits* (1930), and *Mammalian Genetics* (1940).

CASTLE. See **CASTLES AND CHÂTEAUX**.

CASTLE CLINTON (at one time **CASTLE GARDEN** and later the **NEW YORK CITY AQUARIUM**), originally a small, partially submerged, rocky island known as Capske (Copsie, or Copsy), about 200 feet off the shore of the Battery, at the southwestern tip of New York City. In November 1807 the island was given by the city to the federal government for the construction of a fort, completed in 1811 and called West Battery. One of the city's main defenses in the War of 1812, West Battery and Fort Jay on Governors

Island guarded the entrance to the East River. At the war's close in 1815, West Battery was renamed Castle Clinton in honor of DeWitt Clinton, mayor of the city. By an act of Congress, at the end of March 1822, it was ceded back to the city. During its entire history, not one shot had ever been fired at the enemy.

On June 12, 1824, it was leased as an amusement place and opened the following July 3 as Castle Garden. The building, now with a roof added, was used as a reception place, theater, music hall and opera house, and in the 1840's and early 1850's housed numerous exhibitions and fairs. Lafayette was given a reception there in 1824; Jenny Lind, sponsored by P. T. Barnum, made her American debut there on Sept. 11, 1850; and Samuel Morse, in 1835, presented one of the earliest demonstrations of the telegraph. Other notables to have visited Castle Garden were Andrew Jackson, 1832, John Tyler, 1843, and the Hungarian patriot Lajos Kossuth, 1851. In 1855 it became a landing depot for immigrants and on August 3 of that year received its first group of aliens. It remained as an immigration center until 1890 when the federal government moved the station to Ellis Island.

In 1848 the city decided to enlarge Battery Park by extending the mainland, and by 1869 enough land fill had been added to surround Castle Garden on three sides. In 1896 the building was opened as an aquarium which was taken over by the New York Zoological Society in 1902. The aquarium was moved in 1941 to the Bronx Zoo but will be housed in a new building at Coney Island, planned to open about 1955. The original fort, Castle Clinton, was established as a national monument on Aug. 12, 1946, and is being restored; it is under the jurisdiction of the National Park Service. See also **AQUARIUM**.

CASTLE GARDEN. See **CASTLE CLINTON**.

CASTLE HILL, hill near Benedictine monastery at Cassino, Italy, which was captured by Indian troops, March 15–20, 1944, after bitter fighting in World War II.

CASTLE OF OTRANTO, *The*, a novel by Horace Walpole, published in 1764. It owes its importance to the fact that it was the first example of the so-called Gothic romance, a type of fiction which, in the hands of writers like Anne Radcliffe, became highly popular in the late 18th century as a reaction against the sentimental and realistic novels of the school of Richardson; it also prepared the way for the great exploitation of medieval romance in the historical novels of Sir Walter Scott. Intrinsically, *The Castle of Otranto* is interesting chiefly by virtue of its absurdity. The scene is a medieval castle with battlements, trapdoors, and intricate subterranean cloisters; the theme, the mysteries which it harbors within its walls. The plot, involving a gloomy tyrant, a persecuted wife, a lovely young prince, and two romantic girls, employs the supernatural at every turn, such as a gigantic helmet crashing from heaven into a courtyard, or an ancestral portrait stepping forth from its frame and becoming a ghost. These strange matters cause many difficulties for the chief characters but in the end lead to a somber yet satisfactory ending. Walpole based his novel upon his little pseudo-Gothic house at Strawberry Hill, near London, a house which was famous in his time

for its break with the strong neoclassical principles then in vogue.

CASTLE PINCKNEY, national monument. See NATIONAL PARKS AND MONUMENTS.

CASTLE RACKRENT, a novel by Maria Edgeworth, written in 1801. Although it was her first novel, it is still regarded by many critics as her masterpiece. It belongs to that series of novels dealing with Irish life, which elicited the praise of Sir Walter Scott and other contemporaries. The opportunity which Miss Edgeworth had of studying Irish conditions at first hand enabled her in these novels to draw a powerful and substantially accurate picture of contemporary conditions in Ireland. The theme of *Castle Rackrent* is the wasting fortunes and the final disaster of an honorable Irish family as the result of carelessness, improvidence, folly, and absenteeism. The story, of only a few score pages, is told by a faithful old retainer of the family, Thady Quirk, who lives through the successive reigns of Sir Patrick, who drank himself to death; of Sir Murtagh, the close-fisted, who wasted his substance in lawsuits; of the dashing Sir Kit, an absentee landlord, who married a Jewess whom he confined for seven years in her chamber, and who met his death in a duel; and finally of Sir Condy, under whose easy ways the estate finally passed from the hands of the Rackrents into those of creditors, particularly Jason Quirk, the son of old Thady, who bought the debts of the property. The story is told in a vigorous manner, full of local touches of a lively character.

CASTLE SHANNON, kās'1 shān'ūn, borough, Pennsylvania, in Allegheny County; altitude 820 feet; 6 miles south of Pittsburgh; on the Pittsburgh and West Virginia and the Pittsburgh railways. It is a residential community governed by a borough council and a burgess. Founded in 1782, it was incorporated in 1918. Pop. (1950) 5,459.

CASTLEBAR, kās'1-bār', urban district, Ireland, capital of County Mayo; 140 miles northwest of Dublin; on the Castlebar River. It is situated in a cattle-raising and potato-growing region. The town was founded by Sir John Bingham and received its charter in 1613. In 1641 the Parliamentary forces under Sir Henry Bingham surrendered to the Irish Confederates under the earl of Mayo but later were massacred at Shrule Bridge by Edmund Bourke, a clansman of the earl. Nearby is the site of the battle known as "Castlebar Races" in which the French general, Jean Robert Marie Humbert, defeated Gen. Gerald Lake in 1798. Pop. (1946) 4,951.

CASTLEFORD, kās'1-fērd, urban district, England, in West Riding, Yorkshire, on the Aire River; 10 miles southeast of Leeds. It is in a coal mining region, and bottles, pottery, machinery, and chemicals are manufactured. Pop. (1951) 43,116.

CASTLEMAINE, kās'1-mān, town, Australia, in the State of Victoria; 65 miles northwest of Melbourne. It owes its importance to the mining industry carried on in the neighborhood, the most important products of its mines being gold, flagstone, and slate. Its goldmines

are famous as being among the original ones discovered in Australia. Pop. (1947) 5,809.

CASTLEREAGH, VISCOUNT. See STEWART, ROBERT.

CASTLES AND CHATEAUX. The English word castle is derived from the Latin *castellum*, itself a diminutive of *castrum*, a fort. Thus, from its origin, it involved the concept of defensibility. However, in the Vulgate, *castellum* refers to villages whose buildings were fortified. Hence a castle is essentially a defensible home. The French word *château*, with the same root, has come even more to mean a house, usually a large country house.

The Ancient Castle.—Little need be said about fortifications in Egypt. Early in its history, the royal palaces were fortified with towers and parapets, and that tradition lingered on in the homes of the ruling class perhaps after its real military reason had gone. With the expansion of Egypt up the Nile in the 12th dynasty, there was real need for defense on the southern frontier. There the fort of Semna was built with heavy brick walls reinforced by bonding members of timber and by massive buttresses.

The ruling caste in Assyria, renowned in literature for its ferocity, was in constant danger both of internal unrest and of attack from without. Hence thick walls of mud brick bounded such cities as Khorsabad; paired towers flanked the

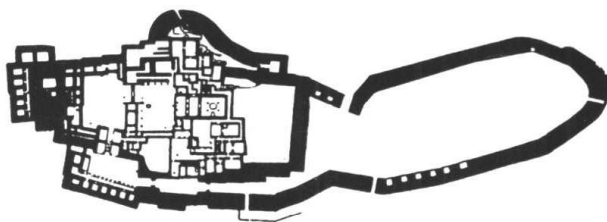


FIG. 1. Citadel, Tiryns.

city gates, with other battlemented towers at intervals along the wall. From these walls and towers in case of attack, the Assyrian archers could discharge their arrows in comparative safety. At one point the city wall was widened into a platform for the palace of Sargon II (722-705 B.C.) which thus became a bastion to protect Khorsabad. Chariots could drive up ramps to the broad top of the wall and into the courts of the one story palace. The gates to the palace, its walls, and even its courts were also provided at intervals with battlemented towers. The palace was arranged around several courts, the men's or royal court with its suite of state apartments, a servants' court or khan, presumably a women's court or harem, and finally an area for religious purposes with its pyramidal tower or ziggurat built up in seven stages. Guardian monsters carved in stone with the legs and body of a lion—or sometimes a bull, the wings of an eagle, and the head of a man flanked the main entrance. Friezes sculptured in low relief in the royal apartments commemorated the king's prowess in warfare or in the hunt. Rugs covered the floors, and no doubt textiles helped to create a sumptuous atmosphere.

The Greek chieftains of the Mycenaean period likewise fortified their palaces. The citadel at Tiryns (Fig. 1), built toward the end of the second millennium B.C., has walls 26 feet thick that approximately follow the contours of its hilltop. These walls are built of "Cyclopean" masonry;

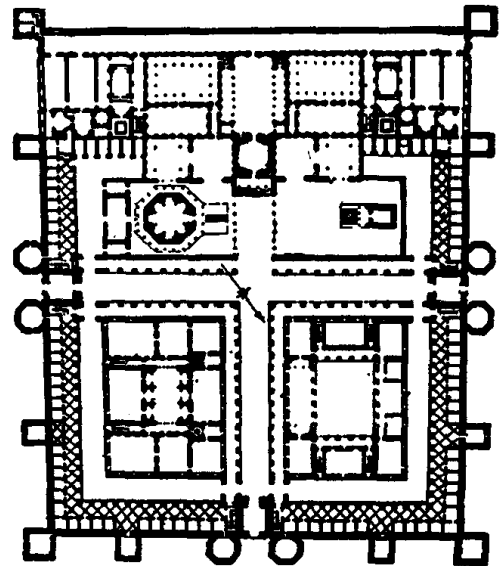
that is, large blocks of stone of irregular shape fitted together. Narrow passagelike chambers covered by corbel vaults penetrate part of the wall from within and probably served as storage space for provisions and weapons. The chariot entrance led up a ramp so arranged that the fortress wall was on the right of the chariot. Since the Greek warrior carried his shield on his left arm and his spear or sword in his right hand, this meant that, during his approach to the gate, his right or unprotected side was exposed. If an attacking party succeeded in forcing the first gate, they found themselves in a narrow alley flanked on both sides by strong walls and with secondary gates at either end, one on the right leading to the lower ward or bailey, the other to the palace area. Still another wall divided the palace from the bailey so that even if the latter were captured, the task of the attackers was by no means over. Narrow postern gates, too small and their approaches too steep for chariots, gave secondary access to the lower ward and to the palace proper. If, however, a peaceful visitor arrived, he might drive his chariot through the gates, through the outer court separated by an entrance pavilion or propylaea from the middle court where he could leave his steeds to enter through a second propylaea into the inner court in front of the men's suite or megaron with its open hearth. This was the center of life in the palace; around it were grouped the quarters for sleeping and other activities of life, and although there was a secondary court and suite of rooms for the womenfolk, the thalamus, approached from the megaron by circuitous routes, nevertheless men and women mingled in the megaron in ordinary daily life. While waiting for Odysseus' return, Penelope worked her embroidery and entertained her suitors here, but retired at night with her maidens into the thalamus.

The Acropolis in Athens, a civic and religious center in historic times, offered great natural facilities for defense; its abrupt slopes, where necessary, were further reinforced by walls. As Athens grew, however, Themistocles walled in the city, about 480 B.C. Rome likewise was defended by walls, parts of which still survive. The old republican wall was outgrown before the empire, but extensive later walls were added, as for example by the Emperor Aurelian, begun 271 A.D.

During the centuries of the *pax romanum*, except near the frontiers, no reason existed to confuse domestic architecture with provision for defense. Though still almost a century would elapse before the first serious incursion of the barbarians through the Rhenish-Danubian frontier, it is almost symbolic that Diocletian in the late 3d century should build his palace at Spalato in what is now Yugoslavia. At least the location brought him closer to the frontier than Rome. Moreover, the plan of his palace (Fig. 2) was influenced by the Roman military camp. The latter was laid out foursquare, its gates in the center of each side with straight roads connecting them and dividing the camp into quarters. Likewise a square wall enclosed Diocletian's palace, and streets bisected it in both directions. Three of the walls were defended by towers at the corners, in pairs around the gates, and at mid-points between the corners and the gates. The fourth wall built on the very shore of the Adriatic needed no defense; it could provide an

open gallery along its length as a promenade. This lack of fortification on the sea front again is suggestive; though Diocletian may not have anticipated an actual assault, it was clear that if one should occur, it would come by land, not by sea. The tribes along the Danubian frontier were landsmen.

The Medieval Castle.—The heyday of the castle as an architectural form in western Europe was the Middle Ages from 1000–1500. For this the feudal system was responsible. The weakness of the royal power permitted the nobility to become nearly independent in fact if not in theory. The system allowed, if it did not actually encourage, the nobility to prey when possible on their neighbors or on the surrounding countryside; therefore, they were compelled to make their own homes as nearly impregnable as might be. Since these conditions existed over most of Europe with some local variations, it follows that the basic ideas of the castle existed alike in France and Germany, in Spain and England, and



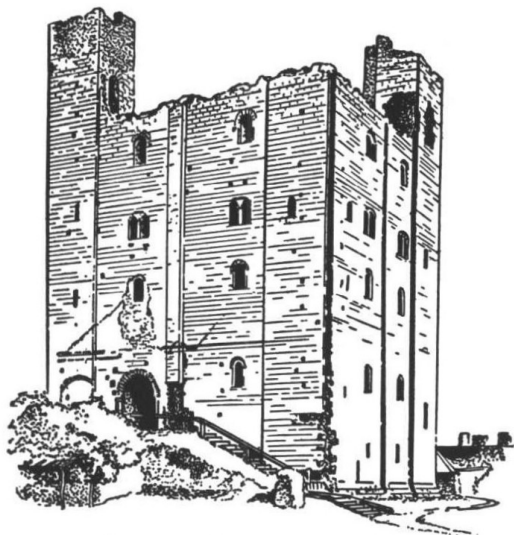
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FIG. 2. Palace of Diocletian, Spalato.

that the variations from country to country are less marked than the similarities.

Although after the Norman Conquest of 1066 the royal power in England was generally stronger than it was on the Continent, the Norman feudal barons required strongholds to control the land and the conquered Saxons. One such, of great historical interest, is the Tower of London begun in 1078 by William the Conqueror. Though complicated by extensive later additions, the White Tower was the nucleus, the keep, so-called because the lord and his garrison lived or kept there. Several stories high with double walls, small windows, and spiral stairs in the corners of the tower, it was quite typical of its day. Perhaps the most interesting feature is the Chapel of St. John, a characteristic small Romanesque church. Such chapels were customary in the larger castles not only to serve the religious needs of the household, but doubtless also were used by the lord of the castle for private conferences since the hall would rarely be empty of retainers.

Hedingham Castle (Fig. 3), Essex, built about 1130, the home of the de Veres, was one of the



Courtesy Country Life, Ltd., London.
FIG. 3. Hedingham Castle.

most perfect of the Norman keeps until it was gutted by fire during World War I. Solidly built with double walls of stone 20 feet thick, its corners were still further reinforced. A flight of steps, arranged like the ramp at Tiryns to expose the unshielded side of an attacker, led up to the door at the level of the second floor. This door entered the great two-storied hall, the center of life for the garrison. Aside from small areas within the thickness of the walls where the meager sanitary facilities of the castle were located, this hall was the interior. Within it the family and its retainers ate, slept, and had their being. Such light as there was came from the few small windows high up in the wall and utterly inadequate by modern standards, but necessarily kept to a minimum not only for defense but for warmth. Since window glass was not available, any warmth on the interior could be preserved only by closing the windows with shutters which excluded even the little light these openings might afford. For heating, a fireplace was built in the center of one side of the hall, its chimney rising in one of the middle buttresses of the outer walls. The ceiling of the hall was carried on a single great arch that spanned the hall from side to side. The familiar round arch of the Romanesque style and its characteristic moldings adorn fireplace, door, windows, and indeed wherever architectural emphasis was required. Above the hall was another chamber of the same size, also warmed by a fireplace. Probably the womenfolk of the household carried on their activities here, and it may also have served as private quarters for the de Veres. Access to it as well as to the ground floor was provided by spiral stairs in one corner of the keep. Since there was no other entrance to the ground floor it could have served as a dungeon for prisoners but was probably used mostly for storage purposes. If the space provided for the varied purposes of living in Hedingham Castle seems restricted, it was clearly because the necessity for defense superseded comfort. Still Hedingham was not quite so confined as this description implies; wooden structures that could be destroyed if a siege were imminent once covered the door and the stairway. Traces of the roofs where they joined the masonry of the keep are still visible.

One of the largest of the Norman keeps was Colchester Castle, Essex, of the late 11th century,

measuring 152 by 111 feet exclusive of the towers, so large in fact that walls subdivided the interior. The upper stories at Colchester have been destroyed, but the keep at Rochester, Kent, rises to a height of more than 100 feet. It was begun by Archbishop William of Corbeil (d. 1136). Somewhat later, perhaps built about 1150, is the small but delightful Castle Rising, Norfolk. In addition to the exceptional richness of its arcades and moldings, we have here an example of a fore building designed to enclose the stair. The door at the ground level gave access to the stairs that led up along the wall of the castle to the main door at the second story.

Perhaps the desire for ampler accommodations contributed to the development of the courtyard castle whose towered and battlemented walls enclosed a more or less extensive bailey or perhaps more than one. Thus in the early 13th century at Pembroke Castle in South Wales, the walls encircling the outer and inner baileys followed the contours of the hilltop with towers at each change of direction. Within the bailey, its entrance guarded by a heavily fortified gatehouse,



FIG. 4. Coucy-le-Château.

was ample room not only for living quarters but for livestock. The concept of the keep was not abandoned, however; it was merely built either within the bailey, as at Pembroke, or in Coucy-le-Château in France as the strongest point in the castle walls. Moreover, the square plan of the Norman keep was changed to a circular tower as were the other towers of the outer walls. This change probably results from the Crusades which brought western Europe into contact with such Byzantine round towers as Rumeli Hisar near Constantinople, built about 1100 by Alexius Comnenus. These Byzantine forts had already influenced the Saracens in their fortifications of Antioch, Nicaea, and Jerusalem that offered such formidable resistance to the crusaders.

Though not large, Coucy-le-Château (Fig. 4) of the early 13th century was an excellent example of the early Gothic castle. Walls whose angles were reinforced with round towers surrounded the irregular court and permitted the living quarters of the garrison to be built within and against the walls. Timber galleries might be added atop these walls and projecting from

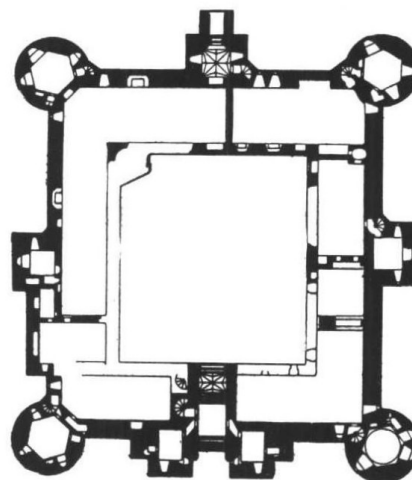
their faces to permit the discharge of missiles on the heads of an attacking party. The keep or dungeon, 210 feet high, was the strongest feature and the point of last resort for the garrison if the bailey should be forced. Actually such castles were rarely taken except by treachery. Coucy never was, and its strength justified the arrogant motto of its lords: "I am not a king, nor a prince, nor a duke, nor even a count; I am the lord of Coucy."

Obviously if the homes of the nobility required such provision for defense, town dwellers also needed protection. Hence arose the walled city. If laid out afresh, and if built on level ground, the defenses were as regular as those of a Roman camp. Thus at Aigues-Mortes in Provence built by St. Louis in the 13th century, square walls with towers at regular intervals defended the town. The gates, also protected by towers, were in the center of each side. Indeed the only element of asymmetry, but a significant one, was the keep placed at one corner of the city walls. A larger and more famous example dating from several centuries is the city of Carcassonne. Here the terrain dictated irregularity in the walls which march up and down the slopes. The Middle Ages though not hostile to symmetry were always willing to abandon it when some requirement of either the site or the building suggested such a departure. The village of Villeneuve-lès-Avignon shows another, though less well-preserved, example. Parts of these old city walls are preserved in many places. Perhaps the best-known English example is Chester where quite an extensive walk on the walls is still possible.

In the second half of the 13th century, Edward I built a series of castles, many of them designed to hold in check the turbulence of the Welsh marches. Caerphilly Castle (1267-1277) in Glamorganshire, one of the earliest built in the Edwardian style, shows the new method of designing the castle with double walls—the inner ones enclosing the inner court or bailey, the second wall completely enveloping the first with space for an outer bailey between them. More than one gate made the task of investment by an enemy more difficult, and the presence of additional outworks still further hindered the attackers. Curtain walls punctuated with round towers suggested a derivation from Saracenic fortifications in Palestine. Conway Castle (1285-1287) in North Wales is another excellent example; long and narrow, its walls follow the contours of a high rock on the shore of the Conway River. Caernarvon Castle (1285-1322) with its hourglass form is on relatively level ground; but the double, or in part even triple, walls of Harlech Castle (1285-1290), Merionethshire, provide for outer, middle, and inner bailies. Naturally the strongest defenses of these castles were concentrated at their weakest points.

Complex as these large royal castles are, they do not provide the clearest illustrations either of what might be required normally for defense or still more of provision for the living requirements of the family and its household. For these purposes it is preferable to examine the small but very picturesque Bodiam Castle. In 1386 a license was granted to Sir Edward Dalyngrigge "that he may strengthen with a wall of stone and lime and crenellate and may construct and make into a castle his manor house of Bodiam, near the sea, in the county of Sussex, for the defense of

the adjacent country and the resistance of our enemies." This rectangular form of castle (Fig. 5) with its omission of the concentric walls of Edwardian castles came into vogue during the Hundred Years' War between France and England. A moat girdled the castle. The principal approach led over a wooden causeway from the side of the moat to a stone outwork, the barbican. A second bridge led in turn from the barbican to the main gate. In case of attack, these bridges, heavy enough for equestrian traffic, could be destroyed in succession; the second bridge would be demolished only if the barbican were captured or for any reason had to be abandoned. A small bridge for pedestrian traffic only crossed the moat to the postern gate at the back of the castle. Round towers defended the corners of Bodiam while square towers, paired around the main gate, marked the center of each side. Small windows, hardly more than loopholes, were strategically placed in the towers so that fire from them could be brought to bear either on the enemy across the moat, or along the walls if the attackers were bold enough to force their way across the water to the base of the wall. In fact the only window of any considerable size



Courtesy Jonathan Cape Ltd., London.

FIG. 5. Bodiam Castle.

was the chapel window, high enough in the wall to be secure. The lower few feet of the walls were battered; that is, designed to slope outward. The purpose of this batter was less structural than military; if the base of the castle were approached, missiles dropped by the defenders from the top of the wall would be deflected outward by the batter against an attacking party.

Naturally the strongest defenses were reserved for the main gate. Here the towers were not only crenellated (battlemented); they were machicolated. The parapet was advanced beyond the plane of the wall on brackets, between which were openings to permit stones or perhaps boiling water to be dropped on the heads of an assaulting party. The notion of pouring molten lead on the enemy was more picturesque than practical in view of the value of metal in the Middle Ages. Loopholes or narrow slits would permit archers or crossbowmen to fire from comparative safety within. The last few feet of the causeway were made into a drawbridge that could be raised at night or when otherwise desirable. Finally a heavy timber grille or portcullis, reinforced with iron, slid down in front of the door, held in place by solid masonry on both sides.

Before the days of gunpowder, such a castle as Bodiam was practically impregnable, if the garrison remained loyal. To besiege such a castle involved keeping an army of sufficient strength in the field long enough to starve the defenders into submission. Since these castles were well provisioned and had their own sources of water within the walls—the kitchen tower at Bodiam had an ample well—a siege could be undertaken only at great cost. Arrows and crossbows would of course have no effect on these masonry walls, but the walls could be undermined. The presence of the moat, however, made that difficult and also hindered the approach up to the walls of movable towers from whose tops an attacking party might force an entrance. Battering rams and catapults that discharged heavy stones might in time batter down such walls, or incendiary arrows might ignite any inflammable materials within the castle; but since most of the interior, like the walls, was made of stone, the possibility of capture by assault was small indeed.

A welcome visitor, on the other hand, might ride across the bridges and through the barbican and the main gate. He would then find himself in the court, lined with rooms for the family and the household. To his left were the private chambers of the family including the castle chapel, small but adequate to the needs of the establishment. To his right and behind him were retainers' quarters and no doubt storage areas. Directly ahead he would see the door to a passage which in turn led to the postern; to the left was the great hall of the castle with the solar or withdrawing room of the lord and the ladies' bower at its further end; and to the right, an entrance to the pantry, the buttery, and the kitchen. These arrangements were almost standard in the later Middle Ages.

Though still the largest single room in the castle, the hall has dwindled in size relative to the space provided for other purposes when compared, for example, to the hall at Hedingham Castle. This smaller size reflected the change in living. No longer was it common to sleep in the hall; bedrooms were provided both for the family and the household. Although still used for meals, the custom of the family eating with the retainers was fading. Two quotations indicate the change. In 1235, Robert Grosseteste, bishop of Lincoln, wrote, "As much as ye may, eat ye in the hall afore your many (household) for that shall be to your profit and worship." But by the 1360's, Piers Plowman could say, "Dull is the hall each day in the week where neither lord nor lady likes to sit. Now has every kingdom a rule requiring one to eat by himself in a private parlor or in a chamber with a fireplace and to avoid the great hall that was made for men to eat in." Piers was kind enough to indicate a probable reason for the change. Although the hall usually had its fireplace, or a fire might be kindled in the center of its stone floor, its large size could not but have left it chilly and drafty. Nor could the rough retainers have been suitable companions at all times for the gentler members of the household. On the other hand, the courtyard solved the problem of adequate lighting for the hall and incidentally for the other rooms of the castle. If the outer wall for defensive reasons could have only a few small windows like those in Hedingham Castle, large windows could open into the court. Glass, how-

ever, remained a rare luxury until the 15th century or even later, and although oiled paper may have shut out some of the drafts, shutters were still the basic way of closing windows.

Next to the hall, the kitchen would be the largest room with its fireplaces perhaps capable of roasting an ox. Space was essential here in view of the number of mouths to be fed. In addition to the family, the household with its servants, its retainers, and its men-at-arms had to be provided for. Since Bodiam Castle required twenty garderobes (toilets), we may safely envision a household of very considerable numbers. These castles or manors also needed extensive storage space for provisions and activities through the year.

Many of the larger and more famous castles result from centuries of building and rebuilding. The royal castle at Windsor, for example, was begun by Edward III to replace an older castle which in part dated back to the time of William the Conqueror but has been much added to later. Kenilworth Castle, Warwickshire, celebrated by Sir Walter Scott, was begun about 1120; it later passed into royal hands, was given by Queen Elizabeth to her favorite, the earl of Leicester, and was subsequently destroyed in part under the Commonwealth for the sake of its building materials. One of the most imposing of them all was Warwick Castle, begun shortly after the Norman Conquest. Probably the most celebrated Irish castle is Blarney, now in ruins but still visited for sentimental reasons. In Scotland, Edinburgh Castle dominates the city; it was once a palace for the kings of Scotland.

The elements of military architecture in the Middle Ages and the life led within the castles did not differ essentially on the Continent from that in England. Thus the Château de Pierrefonds (1390–1400) was girdled first by a moat. Its approximately rectangular curtain wall linked together round towers at the corners, and in the middle of each wall, that serving as the entrance being larger and stronger than the others. The lower part of the walls was battered and their tops provided with machicolated parapets. Quarters for the garrison and retainers lined the courtyard as they had at Bodiam, although the owner, as befitted so high a noble as the duke of Valois, had a nearly independent residence near the gatehouse. Pierrefonds was dismantled in 1617 but restored during the 19th century by Viollet-le-Duc. The ruins of the Château Gailard, near Les Andelys, built by Richard Coeur de Lion are interesting historically. Though also in ruins, the Château de Gisors, its circular keep dating from about 1160, displays an early type. The keep was large enough to contain a chapel and was set within a broad bailey defended by a curtain wall with towers at intervals and with its principal gate heavily defended behind a barbican.

Owing partly to the weakness of the Holy Roman Empire during the later Middle Ages, the decentralization of feudalism was more pronounced in Germany than elsewhere. In consequence many castles were built by the robber barons of Germany to protect their lands or to levy tolls along the waterways and highways. Those along the Rhine from Bingen to Coblenz in particular are picturesque to a degree as they take advantage of the hilly ground. For example, Drachenfels, near Königswinter, was begun by Arnold, archbishop of Cologne, in 1147, and has

been much added to later. The 12th century castle of Schönburg with its four towers, near Oberwesel, is connected by legend with the Lorelei, while still another is Ehrenbreitstein where the Moselle joins the Rhine. Though many of these castles still exist, almost all have been drastically modified later.

The Moorish conquest of Spain and the centuries-long effort of the Christians to free the country brought into being a wealth of castles in the Iberian Peninsula. The place of religion in that war is suggested in the 11th century walled city of Avila with its 86 towers, where the fortresslike apse of the cathedral of later date forms a bastion. The mid-15th century Castillo de Fuensaldaña has a rectangular bailey with a great tower on one side capable of independent defense. The long struggle with the Moors left its mark on many Spanish castles as, for example, on the late 15th century Coca Castle where the Moorish influence is particularly strong. Architecturally, Coca with its immense batter of its lower walls, its multiple circular and polygonal towers and turrets, and its decorative band of brickwork around the top of its walls is magnificent, but Coca was so flimsy in construction as to give more the appearance than the reality of military strength. The Alcazar, Segovia, especially on the interior was also Moorish in style, while its tall and slender turrets at the angles, like minarets, make of it a picturesque "castle in Spain," though in fact the old fortress was destroyed in the 19th century and the present structure is purely modern.

The Renaissance Châteaux.—The medieval castle was almost immune to the weapons and methods of attack of its time. Although gunpowder was known in Europe at least as early as the 14th century, the changes it wrought in fortifications became evident only in the early 16th century. Under its impact, stone walls and towers lost much of their value. Moreover, with the growth of royal power, the intermittent warfare of feudalism disappeared so that defensibility was no longer essential to houses. Even so the influence of the castle was destined to linger on for centuries in French building.

The Italian Renaissance involved greater comfort, even luxury, in living than had existed under the feudal culture of the Middle Ages. Such virtual innovations as chairs, some of them upholstered, and forks as a normal item of tableware point to the growing sophistication of life. Up to the end of the 15th century, the peoples of northern Europe, including the French, remained unaware of these cultural changes. However, in 1494, Charles VIII undertook a military expedition into Italy in a futile attempt to establish his claim to the kingdom of Naples. Though unsuccessful, his venture introduced the culture of Italy to the French aristocracy; it was followed by the Italian invasions of Louis XII, and still later of Francis I. Thus French royalty and nobility were stimulated to try to transplant to France the forms of the Italian Renaissance. For this purpose, they invited Italian artists to Paris and Fontainebleau, and the designs of their châteaux begin to show Italianate elements.

The change could not take place over night. The Louis XII wing (1503) of the Château of Blois, though unfortified, remained predominantly Gothic. Its steep pitched roofs, its window forms, its traceried parapet at the top of the wall bespeak the force of medieval tradition, the

habits of design ingrained for centuries in the French builders. But around the doorway a few details of carving betray an awareness of Italian forms. Though only a few years later, the Francis I wing (1515–1519) at Blois had traveled further along this road. The Italianisms consist essentially of decorative shapes substituted for Gothic details, with but little change in the larger elements of design. Thus instead of Gothic pinnacles and a simple gable over the dormer windows, the new designers preferred candelabra-like shapes and a tabernacle. In place of the Gothic tracery in the parapet, they used heraldic devices and the moldings of a classic cornice. Superposed pilasters created the vertical divisions of the wall. Canopied figures and Italian arabesques adorn the buttresslike supports of the spiral staircase, but the canopies like the dormers have been converted to the new forms. Significantly these rich Italianisms derive not from the serious examples of Renaissance architecture in Florence, but rather from the exuberant detail of such Lombard buildings as the façade of the Certosa at Pavia. Inevitably the French first encountered the north Italian style when they came down over the Alps into the plains of Lombardy, and it was the sumptuousness of this style that first impressed them. Aside from these Italian details, the major building forms continue from the French past. The steep pitched roof, the vertical divisions of the walls, the shape of the windows, and the towerlike projection of the stairway have lingered on. The spiral stairs of the medieval castle were placed in turrets that kept the stairs half inside and half outside the building. However, the stairs are larger here, and the lack of fortifications enables them to be open. So, too, the windows in the outer walls are larger. By this time, glass for windows had become common so that light could be provided without sacrificing warmth.

The Château of Chambord (1519–1538), being a more unified design, obviously shows the persistence in plan of French tradition even though its architect may have been the Italian Domenico Bernabei of Cortona, nicknamed Il Boccadoro. (Fig. 6). Aside from the Italian details carried out with a certain Rabelaisian exuberance, the new influence is apparent in the symmetry of the building. The Renaissance laid greater emphasis on symmetry than had the Gothic even to the extent at times of arranging the windows and doors to balance regardless of the interior, and perhaps of ignoring in their design irregularities of the site, although the latter was not a factor at Chambord.

But if these things point to the Renaissance, others perpetuate the traditions of the castle. The rectangular plan enclosed a court reminiscent of the castle inner baillies. The main unit

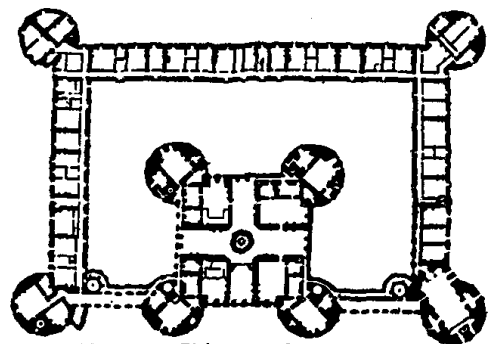


FIG. 6. Château of Chambord.