

第 I 部分：英语客观题 40 分（第 1 页，共 2 页，本页答题时间 12 分钟）

【英语-1】【6 分】以下两个段落共含有 6 个空格，请为其中每个空格选填一个合适的单词。

My parents didn't come to my college graduation; instead, they sent a dozen carnations dyed blue and a gift certificate to a clothing store for middle-aged women. I would (1) my left foot to be there, my mother had said, near tears on the phone. But her voice was drowned out by my sisters screaming at one another, the dog barking, and when she put the phone down to stop the ruckus she got (2) and never came back. It is true that one of my sisters had a dance performance that same weekend, another had a soccer match, and another had final exams, and even if these things had been deemed of less importance than the eldest child's college graduation, my two brothers, who were still in high school, could not be trusted to resist having a party in a house (3) of parents.

This was why, after walking across the (4) and tossing the mortarboard and hugging my friends, I came back alone to my dorm room, (5) my roommates' families, who were loading all their stuff into cars. I closed the door and looked for a long while at my own neatly packed boxes, the stripped mattress. I took my toiletries, "Moby-Dick" from the box of books, a sleeping bag, a pillow, a hiking backpack full of clothes, and (6) out, leaving everything else behind. I didn't say goodbye. I told no one where I was going. I didn't know until I was outside in the softly setting New England sun that I was turning toward the West.

- (1) (A) cut (B) leave (C) give (D) raise (E) set (2) (A) annoyed (B) distracted (C) unpleasant (D) out of mind (E) resentful
(3) (A) in stead (B) in front (C) full (D) short (E) vacant (4) (A) stage (B) square (C) hallway (D) phone room (E) library
(5) (A) dodging (B) and dodged (C) peeking at (D) and peaked at (E) to encounter (6) (A) hurried (B) marched (C) jumped (D) slipped (E) stumbled

【英语-2】【3 分】阅读以下段落，回答问题。

By the time the man with the camera had cut across our neighbor's yard, the twins were out of the trees swingin low and Granny was onto the steps, the screen door bammin soft and scratchy against her palms.
(5) "We thought we'd get a shot or two of the house and everything and then . . ."
"Good mornin," Granny cut him off. And smiled that smile.
"Good mornin," he said, head all down the way
(10) Bingo does when you yell at him about the bones on the kitchen floor. "Nice place you got here, aunty. We thought we'd take a . . ."

"Did you?" said Granny with her eyebrows. Cathy pulled up her socks and giggled.
(15) "Nice things here," said the man buzzin his camera over the yard. The pecan barrels, the sled, me and Cathy, the flowers, the painted stones along the driveway, the trees, the twins, the toolshed.
"I don't know about the thing, the it, and the stuff,"
(20) said Granny still talkin with her eyebrows. "Just people here is what I tend to consider."
Camera man stopped buzzin. Cathy giggled into her collar.
"Mornin, ladies," a new man said. He had come up
(25) behind us when we weren't lookin. "And gents," discoverin the twins givin him a nasty look. "We're

filmin for the county," he said with a smile. "Mind if we shoot a bit around here?"

"I do indeed," said Granny with no smile.
(30) Smilin man was smiling up a storm. So was Cathy. But he didn't seem to have another word to say, so he and the camera man backed on out the yard, but you could hear the camera buzzin still.
"Suppose you just shut that machine off," said
(35) Granny real low through her teeth and took a step down off the porch and then another.
"Now, aunty," Camera said pointin the thing straight at her.
"Your mama and I are not related."

- (1) After Granny's "Good mornin" (line 7), the camera man probably behaves as he _____.
(A) is made to realize that he is intruding (B) suspects that he is in physical danger (C) hopes to win Granny's affection by appearing at ease
(D) is relieved that an adult is present (E) realizes that he is disturbing the tidiness of the yard
(2) Granny's final comment can best be understood as a _____.
(A) reluctant confession (B) tentative assertion (C) witty joke (D) surprising revelation (E) strong rebuke
(3) The episode reveals a conflict between _____.
(A) propriety and impertinence (B) virtue and corruption (C) kindness and cruelty (D) passiveness and aggression (E) refinement and grossness

【英语-3】【3 分】根据释义和首字母填写单词。

- (1) i ____: to set afire (2) l ____: enclosely or nearly enclosed by land (3) s ____: not overtly or specifically religious

第 I 部分：英语客观题 40 分（第 2 页，共 2 页，本页答题时间 28 分钟）

【英语-4】【8 分】一个长句被切分为 7 个部分，去掉了相关标点符号以及句首的大写，然后打乱顺序。请找回原先的顺序。

- (A) and the District Court has a heavy responsibility to ensure that material involving Presidential conversations irrelevant to
(B) and that such material be returned under seal to its lawful custodian (C) consistent with the fair administration of justice
(D) since a president's communications encompass a vastly wider range of sensitive material (E) than would be true of an ordinary individual
(F) the public interest requires that Presidential confidentiality be afforded the greatest protection
(G) or inadmissible in the criminal prosecution be accorded the high degree of respect due a President

原先顺序为__-__-__-C-__-__-__。

【英语-5】【14 分】请为每个空格按照首字母提示填写一个合适的单词。

Thomas Hardy's impulses as a writer, all of which he indulged in his novels, were numerous and divergent, and they did not always work together in h _____. Hardy was to some degree interested in exploring his characters' psychologies, though impelled less by curiosity than by sympathy. Occasionally he felt the impulse to comedy (in all its detached coldness) as well as the impulse to farce, but he was more often inclined to see t _____ and record it. He was also inclined to literary realism in the several senses of that phrase. He wanted to describe ordinary human beings; he wanted to speculate on their dilemmas rationally (and, unfortunately, even schematically); and he wanted to record precisely the material universe. Finally, he wanted to be m _____ than a realist. He wanted to transcend what he considered to be the banality of solely recording things exactly and to express as well his awareness of the occult and the strange.

In his novels these various impulses were sacrificed to each other i _____ and often. Inevitably, because Hardy did not care in the way that novelists such as Flaubert or James cared, and therefore took paths of least resistance. Thus, one impulse often surrendered to a fresher one and, unfortunately, instead of exacting a compromise, simply disappeared. A desire to throw over reality a light that never was might give way abruptly to the desire on the part of what we might consider a novelist-scientist to record exactly and concretely the structure and texture of a flower. In this instance, the new impulse was at least an energetic one, and thus its indulgence did not result in a relaxed style. But on other occasions Hardy abandoned a perilous, risky, and highly energizing impulse in f _____ of what was for him the fatally relaxing impulse to classify and schematize abstractly. When a relaxing impulse was indulged, the style—that sure index of an author's literary worth—was certain to become verbose. Hardy's weakness derived from his apparent inability to control the comings and goings of these divergent impulses and from his unwillingness to cultivate and sustain the energetic and risky ones. He submitted to first one and then another, and the spirit blew where it listed; hence the unevenness of any one of his novels. His most controlled novel, *Under the Greenwood Tree*, prominently exhibits two different but reconcilable i _____—a desire to be a realist-historian and a desire to be a psychologist of love—but the slight interlockings of plot are not enough to bind the two completely together. Thus even this book s _____ into two distinct parts.

【英语-6】【6 分】请为每个空格按照开头两个字母的提示填写一个合适的单词。

Transition state analogues are molecules that closely resemble a substrate's transition state structure in a re _____ catalyzed by enzymes. The study of transition state analogues is one of the few techniques of rational drug design used to develop new pharmaceuticals. One of the more well known drugs discovered through this technique is Oseltamivir, which is a potent therapy against the infectious influenza virus. Oseltamivir is a competitive inhibitor for the enzyme neuraminidase and prevents neuraminidase from acting on its intended substrate, sialic acid. Neuraminidase is no _____ found on the influenza virus protein coat and hydrolyzes sialic acid molecules found on the exterior of host cell membranes to allow newly made viral particles to exit the original host cell, and begin infecting other host cells. Through the ti _____ binding of Oseltamivir to neuraminidase's active site, this process is inhibited, and the infectivity of the influenza virus is reduced. Due to the fact that Oseltamivir is a transition state analogue of sialic acid, their chemical structures are quite similar...

（第 I 部分：英语客观题部分结束）

【英语-1 答案】 CB EAAD 【每空 1 分，共 6 分】

【英语-2 答案】 AEA 【每空 1 分，共 3 分】

【英语-3 答案】 ignite; landlocked; secular 【每词 1 分，共 3 分】

【英语-4 答案】 D-E-F-(C)-A-G-B 【答对 D-E-F 得 4 分；答对 A-G-B 得 4 分，共 8 分】

【英语-5 答案】 harmony; tragedy; more; inevitably; favor; impulses; splits 【每空 2 分，共 14 分】

【英语-6 答案】 reaction; normally; tight 【每空 2 分，共 6 分】

第 II 部分：语文客观题 40 分（第 1 页，共 2 页，本页答题时间 24 分钟）

【语文-1】【5 分】以下宋代诏书中，有五处空白，每处需要填上 1-2 个字（答题纸上每条横线一个字）。

削夺李筠官爵令诸道会兵进讨诏建隆元年五月甲辰

周文圣德。尚伐于崇侯。**1**神功。亦征于英布。不有戎臣之叛乱。曷彰王业之艰难。其有素蓄奸谋。不知天命。将定一戎之略。须兴九伐之兵。诞告**2**师。其陈名罪。昭义军节度使检校太师中书令李筠。出于贱隶。列在公侯。长兴中事秦王从荣。不能死难。天福末随燕王延寿。姑务自全。既侥幸于乱离。每包藏于诡譎。昔周祖在位。已萌不轨之心。世宗临朝。益露无君之状。朕以天人合庆。历数在躬。念同事于前朝。每曲形于厚礼。推**3**

而示信。指白水以申盟。而不体明诚。自怀反侧。窥觊**4**。干犯天常。因辱使臣。虔刘民吏。结刘筠于并垒。害张福于高平。窃弄干戈。谋犯京阙。罔顺两阶之舞。爰兴六月之征。止罪渠魁。无治逼胁。宜削夺李筠在身官爵。令诸道会兵进讨。戮兹大慝。**5**我疲民。况上党成师。黎成旧俗。素推效顺。必自改图。苟去危以就安。即转祸而为福。立功名于当世。保富贵以终身。勿怀迷复之凶。自取覆亡之咎。凡尔士庶。当体朕心。

【语文-2】【4 分】以下这段文字中有四处语病，请将相应的字母标号填在答题纸上。

(A)截止今年 12 月 15 日，(B)已经先后(C)有三十多家企业报名。(D)其中有五家(E)已经捷足先登，(F)抢先一步(G)入住园区。(H)这三十多家企业的领头人中，(I)既有(J)刚刚大学毕业的年轻创业者，(K)也有早享盛名、(L)身价过亿的(M)成功企业家。(N)他们的共同特点是(O)被园区的优惠政策，(P)以及管委会的优质服务(Q)所打动，(R)认定本园将会(S)成为前途无量的(T)优质企业聚集地。(U)去年有个别企业家(V)了解我们园区后(W)不以为然，(X)现在(Y)则感到后悔……

【语文-3】【9 分】请按照给出的首字填写成语或者典故，每条短横线一个字。

大作立意高远，字____，虽然老兄不追求洛____，其实足以藏____。相形之下，那个无名小卒的投稿一味媚俗，满篇未闻黄____，只有郑____。孰料这编辑有眼无珠，将老兄呕心沥血之作弃____，却将那小辈俗不可耐的投稿视____。看来，老兄这次投稿所____，真是明____了。

【语文-4】【6 分】阅读以下摘自《脂砚斋全评石头记》的段落，为每处空白选择恰当的内容（均为单选题）。

凤姐忙向贾蔷道：再不略让一步，正是阿凤一生绝断处。“既这样，我有两个在行妥当人，你就带他们去办，这个便宜了你呢。”贾蔷忙赔笑说：“正要和婶婶讨两个人呢，写贾蔷乖处如见。这可巧了。”因问名字。凤姐便问赵嬷嬷。彼时赵嬷嬷已听呆了话，**(1)**忙笑推他，他才醒悟过来^③，忙说：“一个叫赵天梁，一个叫赵天栋。”凤姐道：“可别忘了，我可干我的去了^④。”说着，便出去了。贾蓉忙送出来，又悄悄向凤姐道：“婶子要什么东西，吩咐我开个帐给蔷兄弟带了去，叫他按帐置办了

来。”凤姐笑道：**(2)**我的东西还没处撂呢^⑥，希罕你们鬼鬼祟祟的？”说着一径去了。阿凤欺人处如此。忽又写到利弊，真令人一叹也！

这里贾蔷也悄问贾琏：“要什么东西？顺便织来孝敬。”贾琏笑道：“**(3)**才学着办事，倒先学会了这把戏。我短了什么，少不得写信来告诉你^⑦，且不要论到这里。”说毕，打发他二人去了。接着回事人来，不止三四次，贾琏害乏，便传与二门上，一应不许传报，俱等明日料理。凤姐至三更时分方下来安歇^⑧，一宿无话。

(1) (A) 贾琏 (B) 凤姐 (C) 贾蓉 (D) 贾蔷 (E) 平儿

(2) (A) 别放你娘的屁！ (B) 谁教你的这些？ (C) 还不给我住口！ (D) 你倒是想得多。 (E) 蓉儿不必多言。

(3) (A) 何须如此？ (B) 你别兴头。 (C) 少来放屁！ (D) 万万不可。 (E) 你真聪明！

第 II 部分：语文客观题 40 分（第 2 页，共 2 页，本页答题时间 16 分钟）

【语文-5】【6 分】黄景仁是清代的天才诗人，他的代表作为《绮怀》十六首，其二云：“妙语谐谑擅心灵，不用千呼出画(1)。敛袖搊成弦杂拉，隔窗掺碎鼓丁宁。游裙斗草春多事，六博弹棋(2)未停。记得酒阑人散后，(3)寥珠箔数春星。”请认真阅读这首作品，并推断三处略去的字。

【语文-6】【3 分】古诗填空，每条横线一个字。

某甲和某乙是南京某中学的同学，一起参加高考。某甲考上了南大，而某乙发挥失常，被迫复读。这个周末，两人凑巧在新街口相遇，某乙引用古诗向某甲表达自己的心情：“____ 无限____ ，____ 不____ 。”某甲则引用古诗安慰他道：“____ 多____ ，____ 未____ 。”回到家后，某乙在日记本上写下诗句“____ 夜半____ ，不____ 不____ ”，下定决心明年一定要成功。

【语文-7】【5 分】以下文字已经被打乱顺序，并删除部分标点符号。请找出其正确的顺序。

- (1) 本病的病因尚不完全清楚，可能是多种因素长期相互作用的结果
- (2) 同时刺激黏膜下感受器，使副交感神经功能亢进，使支气管平滑肌收缩，腺体分泌亢进，杯状细胞增生，黏液分泌增加，气道阻力增加
- (3) 香烟烟雾还可使氧自由基产生增多，诱导中性粒细胞释放蛋白酶，抑制抗胰蛋白酶系统，破坏肺弹力纤维，引发肺气肿的形成
- (4) 有害气体和有害颗粒 如香烟、烟雾、粉尘、刺激性气体（二氧化硫、二氧化氮、氯气、臭氧等）
- (5) 这些理化因素可损伤气道上皮细胞，使纤毛运动减退，巨噬细胞吞噬能力降低，导致气道净化功能下降

正确的顺序为：____ - ____ - ____ - ____ - ____

【语文-8】【2 分】请阅读小说片段，并判断以下哪一项出自同一篇小说。

再等韦荷马老师见到我时，也用非常警惕的目光看着我，试探地问：“盐是甜的还是咸的？”韦荷马老师是蹲在他家门前筛炉灰，捡煤核儿时问我的，他一脑袋的煤尘，穿着的那件蓝棉袄和大象皮一样皱皱重重，颜色无二。他鼻翼两侧也夹着同色的煤尘，我忍不住噗哧儿笑了，昂首挺胸的韦荷马老师前脚他才告诉我宏伟即罗马，后脚他就成了这副模样，他捡回来的煤核儿连筐底还没铺满呢，还有，他老婆双手团抱在胸前，柱子一样站在丈远处，面部表情类似蒙克的版画《尖叫》，非常钻研地左眼看着我，右眼也斜着她男人。

- (A) 江远澜面无惧色，更无愧色，但说出的话颠三倒四，一会儿说人的灵魂是非常安静的，他喜欢自己单独地行走，一会儿又说你们根本就不了解人的灵魂。
- (B) 比如有一回张永红对王琦瑶说：薇薇姆妈，其实你是真时髦，我们是假时髦。王琦瑶笑道：我算什么时髦，我都是旧翻新。张永红就说：对，你就是旧翻新的时髦。

- (C) 黄苏子心里面的脏活几近喷薄而出。她觉得自己额上的青筋已经绷了起来，脖子都在一咕咯一咕咯地鼓动着。在她的感觉中，她的骂声早已压过了冲天而起的大笑。
- (D) 宋凡平蹲下来擦着两个孩子的眼泪，那时候天已经黑下来了，他什么话都没说，只是擦着他们的眼泪。两个孩子突然看到他哭了，他笑着看他们，可是他的眼泪却在流出来。
- (E) 梵梵没有心思做饭，她靠在床上，任凭窗外的天空由橘红变成深紫又变成紫黑，屋里的家具只留下模糊的轮廓，也不去开灯。她躺在昏暗中，心头乱如麻。

（第 II 部分：语文客观题部分结束）

【语文-1 答案】(1)汉祖 (2)六 (3)赤心 (4)神器 (5)吊 【每处空白 1 分，共 5 分】

【语文-2 答案】 AGLW 【填写在答题纸的 4 个答案中，每选对 1 个得 1 分，共 4 分；如果强行填写超过 4 个答案，每超过 1 个倒扣 1 分】

【语文-3 答案】字字珠玑 洛阳纸贵 藏之名山(“藏于名山”也可) 黄钟大吕 郑声卫音(“郑声卫乐”、“郑卫之声”、“郑卫之音”、“郑卫之乐”都可)
弃若弊履(“弃若弊屣”、“弃如弊屣”、“弃如弊履”也可) 视同拱壁(“视若拱璧”、“视如拱璧”也可) 所遇非人 明珠暗投 【每个成语 1 分，共 9 分】

【语文-4 答案】(1)E (2)A (3)B 【每处空白 2 分，共 6 分】

【语文-5 答案】(1)屏 (2)夜 (3)共 【每个字 2 分，共 6 分】

【语文-6 答案】世间无限丹青手，一片伤心画不成。江东子弟多才俊，卷土重来未可知。子规夜半犹啼血，不信东风唤不回。【每句 1 分，共 3 分】

【语文-7 答案】1-4-5-2-3 【每个位置 1 分，共 5 分】

【语文-8 答案】A 【2 分】

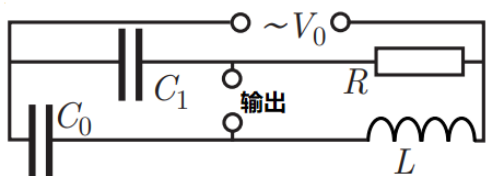
第 III 部分：综合客观题 40 分（第 1 页，共 2 页，本页答题时间 30 分钟）

【综合-1】【4 分】以下八个均为中国古代的年号：(A) 成化；(B) 道光；(C) 建文；(D) 建炎；(E) 神龙；(F) 太平兴国；(G) 同治；(H) 至正。如果按照时间顺序排列，那么(1)排在第二个的是_____；(2)排在第四个的是_____；(3)排在第六个的是_____；(4)排在第八个的是_____。(请在答题纸上填写字母标号，不要写汉字！)

【综合-2】【4 分】(1) 中国现代文学家甲写诗献给他父亲：“绝怜高处多风雨，莫到琼楼最上层。”甲的一个儿子则是著名物理学家_____。(2) 南京大学教师胡福明发表了《实践是检验真理的唯一标准》一文，从理论上彻底否定了“两个_____”。(3) 晚清四大奇案中的“_____”一案，往往被认为反映了清朝朝廷与湘军势力之间激烈的政治斗争。(4)_____是首位从美国大学获得学位的华人，他开创了中国近代的留学事业，被誉为“中国留学生之父”。

【综合-3】【3 分】(1) 除了德国之外，_____ (国家名) 也以德语为唯一官方语言。(2) 世界上最大的葡萄牙语国家是_____。(3) 巴基斯坦的两种官方语言是英语和_____。

【综合-4】【3 分】考虑以下城市：(A) 博鳌 (B) 固原 (C) 铁岭 (D) 石狮 (E) 宜昌。(1) 如果按照经度从低到高，排在第 3 位的是_____。如果按照纬度从低到高，(2) 那么排在第 2 位的是_____，排在第 4 位的是_____。(请在答题纸上填写字母标号，不要写汉字！)



【综合-5】【4 分】如左图所示的电路，含有电阻 R 、电感 L ，和两个电容 C_0 、 C_1 。在输入端加上峰值为 V_0 的交流电压后，发现输出端的电压为无穷大。由此可知输入交流电压的频率为 $\omega_0 =$ _____。现在，我们将输入交流电压频率改为 $2\omega_0$ ，然后又选择 C_1 的值使得输出与输入之间的相位差(只考虑相位差的大小，不考虑相位差的正负号)达到最大。这时，输入与输出之间的相位差的大小为_____。

【综合-6】【4 分】一家企业的生产函数 $f(z) = z$ (当 $0 \leq z < 1$ 时)； $f(z) = 1 + \sqrt{z-1}$ (当 $z \geq 1$ 时)。(生产函数的含义是：当投入数量为 z 的原材料时，最多可以生产数量为 $f(z)$ 的产品。)假设 1 个单位的产品价格为 1，而 1 个单位的原材料价格为 $w > 0$ 。如果企业希望最大化其利润，那么应该购买_____单位的原材料。企业获得的最大利润则为_____。

【综合-7】【2 分】有一种遗传病是由 X 染色体上的一个显性基因引起的。一名健康的男性和一名患病的女性(纯合子概率为 0.25)结婚后，所生的儿子的患病概率为_____。

第 III 部分：综合客观题 40 分（第 1 页，共 2 页，本页答题时间 20 分钟）

【综合-8】【4 分】甲乙二人合谋，为谋财要干一件“大事”。甲按分工找到丙，骗丙说钱某欠债不还，要丙控制钱某的小孩以逼钱某还债。丙将小孩骗到自己的住处看管起来，电告甲控制了钱某的小孩，于是甲通知乙行动。乙给钱某打电话：“你儿子在我们手上，赶快交 50 万元赎人，否则撕票！”钱某看了一眼身旁的儿子，回了句：“骗子！”便挂断电话，不再理睬。乙感觉异常，将情况告诉甲。甲来到丙处，发现这个孩子不是钱某的小孩而是赵某的小孩。但甲没有告诉丙，只是嘱咐丙看好小孩，并从小孩口中套出其父赵某的电话号码。

甲与乙商定转而勒索赵某的钱财。第二天，小孩哭闹不止要离开，丙恐被人发觉，用手捂住小孩口、鼻，致其机械性窒息死亡。甲得知后与乙商定放弃勒索赵某财物，由乙和丙处理尸体。乙、丙二人将尸体连夜运至城外掩埋。第三天，乙打电话给赵某，威胁赵某赶快向指定账号打款 30 万元，不许报警，否则撕票。赵某当即报案，甲、乙、丙三人很快归案。

在本案中，每个人分别犯什么罪？甲：_____ 乙：_____ 丙：_____

化学元素周期表																	18
1A																2	
1 H 1.008																2 He 4.00	
3 Li 6.941	4 Be 9.012															10 Ne 20.18	
11 Na 22.99	12 Mg 24.31	3 B 10.81	4 C 12.01	5 N 14.01	6 O 16.00	7 F 19.00	8 Ne 20.18	9 F 19.00	10 Ne 20.18	11 Na 22.99	12 Mg 24.31	13 Al 26.98	14 Si 28.09	15 P 30.97	16 S 32.07	17 Cl 35.45	18 Ar 39.95
19 K 39.10	20 Ca 40.08	21 Sc 44.96	22 Ti 47.88	23 V 50.94	24 Cr 52.00	25 Mn 54.94	26 Fe 55.85	27 Co 58.93	28 Ni 58.69	29 Cu 63.55	30 Zn 65.39	31 Ga 69.72	32 Ge 72.61	33 As 74.92	34 Se 78.97	35 Br 79.90	36 Kr 83.80
37 Rb 85.47	38 Sr 87.62	39 Y 88.91	40 Zr 91.22	41 Nb 92.91	42 Mo 95.95	43 Tc (98)	44 Ru 101.1	45 Rh 102.9	46 Pd 106.4	47 Ag 107.9	48 Cd 112.4	49 In 114.8	50 Sn 118.7	51 Sb 121.8	52 Te 127.6	53 I 126.9	54 Xe 131.3
55 Cs 132.9	56 Ba 137.3	57 La 138.9	72 Hf 178.5	73 Ta 180.9	74 W 183.8	75 Re 186.2	76 Os 190.2	77 Ir 192.2	78 Pt 195.1	79 Au 197.0	80 Hg 200.6	81 Tl 204.4	82 Pb 207.2	83 Bi 209.0	84 Po (209)	85 At (210)	86 Rn (222)
87 Fr (223)	88 Ra (226)	89 Ac (227)	104 Db (261)	105 Dsb (262)	106 Dsb (262)	107 Hs (265)	108 Mt (266)	109 Ds (281)	110 Rg (281)	111 Cn (285)	112 Cn (285)	113 Nh (286)	114 Fl (289)	115 Mc (289)	116 Lv (293)	117 Ts (294)	118 Og (294)
58 Ce 140.1	59 Pr 140.9	60 Nd 144.2	61 Pm (145)	62 Sm 150.4	63 Eu 152.0	64 Gd 157.3	65 Tb 158.9	66 Dy 162.5	67 Ho 164.9	68 Er 167.3	69 Tm 168.9	70 Yb 173.0	71 Lu 175.0				
90 Th 232.0	91 Pa 231.0	92 U 238.0	93 Np (237)	94 Pu (244)	95 Am (243)	96 Cm (247)	97 Bk (247)	98 Cf (251)	99 Es (252)	100 Fm (257)	101 Md (258)	102 No (259)	103 Lr (262)				

【综合-9】【5 分】一种氧化物 X_mO_n 为白色固体。首先进行实验一：

$$R = 8.314 \text{ J mol}^{-1} \text{ K}^{-1}$$

$$R = 0.08314 \text{ L bar mol}^{-1} \text{ K}^{-1}$$

$$F = 96,500 \text{ C mol}^{-1}$$

$$F = 96,500 \text{ J V}^{-1} \text{ mol}^{-1}$$

$$N_A = 6.022 \times 10^{23} \text{ mol}^{-1}$$

$$h = 6.626 \times 10^{-34} \text{ J s}$$

$$c = 2.998 \times 10^8 \text{ m s}^{-1}$$

$$0^\circ \text{C} = 273.15 \text{ K}$$

$$1 \text{ atm} = 1.013 \text{ bar} = 760 \text{ mm Hg}$$

将 69.5 毫克该氧化物放在一个 1 升的空容器里，缓缓加热直至该氧化物完全气化。此时，容器中的压强为 20 毫米汞柱，温度为 239.7 摄氏度。又进行实验二：将 1 毫克该氧化物溶解在酸性水溶液中，用 1 安培电流电解 58 分钟后，X 元素的单质全部在阴极析出。再进行实验三：将 X_mO_n 放入氢氧化钡的饱和水溶液中，发现反应时会产生白色沉淀。通过这三个实验，

我们可以推断：m=___，n=___，X 元素为___。

【综合-10】【2 分】如果一种商品的需求增加而供应减少，那么这种商品的均衡价格_____，均衡数量_____。以上两个空格都请在以下选项中选择：(A)必然增加 (B)必然减少 (C)必然不变 (D)有可能增加，也有可能不变 (E)有可能减少，也有可能不变 (F)必然变化 (G)变化趋势无法判断

【综合 11】【5 分】如左图所示，一根长 L 的、质量均匀分布的棍子放在被轻轻地放在一个墙角。墙壁和地面都是光滑的。刚开始时，棍子初速度为 0，并且其下端离墙角非常近。当棍子被释放后，其下端向离开墙壁的方向滑动，而其上端则沿墙壁向下滑动。在很长时间之后，棍子质心在水平方向的速度为_____。

第 III 部分：综合客观题部分结束

【综合-1 答案】(1)F (2) H (3) A (4) G 【每个空 1 分，共 4 分】

【综合-2 答案】(1)袁家骝 (2)凡是 (3) 【题目不严谨，全部送分】 (4)容闳 【每个空 1 分，共 4 分】

【综合-3 答案】(1) 奥地利 【“列支敦士登”也算对】 (2) 巴西 (3) 乌尔都语 【每个空 1 分，共 3 分】

【综合-4 答案】(1)E (2) D (3) B 【每个空 1 分，共 3 分】

【综合-5 答案】 $\frac{1}{\sqrt{c_0 L}}$; $\arctan(\frac{3}{4})$ (也可以写为 $\arcsin(\frac{3}{5})$ 或者 $\arccos(\frac{4}{5})$ 等) 【每空 2 分，共 4 分】

【综合-6 答案】 $1 + \frac{1}{4w^2}$; $1 - w + \frac{1}{4w}$ 【两个空各 2 分，共 4 分】

【综合-7 答案】 0.625 【2 分】

【综合-8 答案】(甲) 绑架罪； (乙)绑架罪； (丙)非法拘禁罪、故意杀人罪 【每个罪名 1 分，共 4 分】

【综合-9 答案】 1； 2 ； Se (“铯” 也算对) 【1 分+2 分+2 分，共 5 分】

【综合-10 答案】 A; G 【两个空各 1 分，共 2 分】

【综合-11 答案】 $\frac{1}{3}\sqrt{gL}$ · 【5 分】